

DUKE NUKEM: ZERO HOUR • WHEEL OF TIME • RUSH 2

NINTENDO 64 • PLAYSTATION • PC • DREAMCAST • ARCADE • ONLINE

Tokyo
Game Show
Special
Report

NEXT GENERATION

The world's #1 computer and videogame authority

In depth review:

TOMB RAIDER 3

Are we still in love?

**PLUS: How Lara Croft is
cheating on you**

Dreamcast

12 pages of exclusive
news and interviews

- **Virtua Fighter 3th**
- **Sega Rally 2**
- **Geist Force**

Voodoo 3

Performance
enhanced

January 1999 Issue 49
www.next-generation.com



PSX 2
Exclusive
launch info!

©1998 Gremlin Interactive Ltd. Licensed from and developed by Gremlin Interactive Ltd. ©1998 Twentieth Century Fox Film Corporation Inc. All Rights Reserved.
"Twentieth Century Fox," "Fox" and their associated logos are the property of Twentieth Century Fox Film Corporation. All Rights Reserved. PlayStation and the
PlayStation logos are registered trademarks of Sony Computer Entertainment Inc. NASCAR is a registered trademark of the National Association for Stock Car Auto
Racing, Inc. and NASA is a trademark of the National Aeronautics and Space Administration. This product is not in any way associated with NASA or NASCAR.



JOIN THE TRANSINTERNET SPEED LEAGUE AT OUR WEBSITE AND



one
part

NASCAR

one part

NASA

"meterhead."



"LOOKING FOR INTENSE HIGH SPEED ACTION?
THIS IS JUST WHAT THE DOCTOR ORDERED"



COMPETE IN MULTIPLAYER MODE FOR PRIZES. www.foxinteractive.com





RAPID PROGRESSION

In October of 1996, **Next Generation** introduced you to a rising star — a female videogame character poised to show Mario and Sonic the door. Two years and two games later, Lara Croft is an international icon — a digital superstar — but we knew her when she was just the girl next door. As *Tomb Raider 3* hits the shelves, **Next Generation** gives you the verdict. Are we still in love? Find out on page 96.

They lie. They cheat. They'll do anything to make you think you're seeing something you're not. Who are they? Game developers. And this month, in addition to reporting on the fruits of their labors, we reveal their darkest technical secrets (page 74).

As for the game industry's best-kept secret in the age of 3D, Shigeru Miyamoto seems to be keeping that to himself. Two years after its release, *Mario 64* has yet to be eclipsed by another 3D platformer. In a special report, we look at the pretenders to the throne, and examine the 10 things every 3D platformer could learn from Mario (page 82).

That's a feature that Sega of America's Vice President of Product Development, Eric Hammond, may want to cut out and frame as he oversees the birth of the second generation Dreamcast games. We get him talking on page 88.

And as Dreamcast rolls out in Japan, **Next Generation** brings you a new section dedicated to keeping you in touch with the rapidly expanding world of Sega's new super-console. "Dreamcast Countdown" is where you'll find news, previews, and import reviews of the games that will shape the system in the days that lead up to the crucial U.S. launch. The countdown begins on page 25.

The future is closer than you think.

NEXT GENERATION





It's a dark cave. Inside your head, you hear your heart pounding.
Damp **echoes** resonate from the slow **drip** of water. A low **rumble**.

Click — a gun is being cocked to your right.

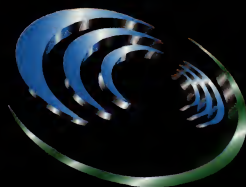
You spin. You duck. You freeze in fear.

Bullets tear past you and **ricochet** from every angle.

You can't see her, but you know exactly where she is.

*Great games deserve great audio. Look for this logo or visit
www.env-audio.com/listen/*

So real it has to be live!



**Environmental
Audio™**
by **CREATIVE®**

CONTACT

NEXT GENERATION
Imagine Media, Inc.
150 North Hill Drive, Brisbane CA 94005

EDITORIAL

voice: 415. 468. 4684 fax: 415. 468. 4686
email: ngonline@imaginamedia.com

ADVERTISING

voice: 415. 468. 4684 x123 fax: 415. 468. 4686
email: jim@next-generation.com

If you have questions about a subscription, please contact: **Customer Service** 800. 578. 3643
email: subscribe@next-generation.com
with "Next Generation" as the subject

EDITORIAL

CHRIS CHARLA editor-in-chief
SIMON COX executive editor
CHRISTINE ZENDER editing managing editor
TOM RUSSO senior editor
JEFF LUNDGRIGAN still more senior editor
FRANCESCA REYES zeide correspondent

MIKE WILMOTH senior art director
LISA CHIDO assistant art director

AARON LOEB editor-in-chief, NG Online
COLIN CAMPBELL Brisbane correspondent
NICOLAS DI COSTANZO Japanese correspondent

EDITORIAL CONTRIBUTORS

Jeff Chen, Mark East, Blake Fischer, Stephen Frost, Steve Kent, John Lee, Lisa Mike, Frank O'Connor, Adam Pavlecka, Doug Perry, Ellen Rush, Marcus Webb, Mike Wolf

PHOTOGRAPHY

Jude Edgington

Next Generation uses Micron PCs
http://www.micronpc.com

For reprints call The Reprint Dept. 717.481.8500

ADVERTISING

NANCY ROMANO regional advertising manager
LORI HOVLAND regional advertising manager
MICHELLE STRATTON marketing manager
ADRIENNE ROMANOWICZ ad coordinator

PRODUCTION

RICHARD LESOVY production director
SUSAN MEREDITH production coordinator

IMAGINE MEDIA, INC.

BILL BLUMMER publisher
KATE BAILEY subscription director
BRUCE ELDRIDGE newsstand director
THEA SELBY newsstand manager
JENNIFER CARSON direct marketing specialist
CHRISTOPHER BOILY newsstand mktg. analyst
INTERNATIONAL LICENSING REPRESENTATIVE
Robert J. Abramson and Associates, Inc.
720 Post Road, Scarsdale, New York 10583

Entire contents © 1999, Imagine Media, Inc. All rights reserved. Reproduction in whole or in part without permission is prohibited. Imagine Media, Inc. also publishes PC Accelerator, PC Gamer, PSM, Business 2.0, Maximum PC, and Modesto. Products named in these pages are trademarks or trademarks of their respective companies. Imagine Media, Inc. is not affiliated with the companies or products covered in Next Generation. Printed in the USA

Next Generation shares editorial (and editors) with the UK-based magazine EDGE. Unpublished manuscripts cannot be returned or acknowledged. Letters may be edited for space, clarity, or so we look cool. You might think things get confused with two Chris's in the office. Well, trust where you're right. Bosses: still. Vices: rubbish.



imagine
MEDIA WITH PASSION

IMAGINE MEDIA, INC.,
150 North Hill Dr., Brisbane, CA 94005
(415) 468-4684 www.imaginamedia.com

CHRIS ANDERSON CEO

TOM VALENTINO vice president/CFO
HOLLY KUNGEL vice president/circulation
CHARLES SCHUG general counsel

IMAGINE ENTERTAINMENT DIVISION:

JONATHAN SIMPSON-BINT president
(Next Generation, IGN, Games Business, PC Accelerator, PSM, the Den, PC Gamer)

IMAGINE DIGITAL DIVISION:

MARK GROSS president

Imagine Media is at aimed people who have a passion. A passion for games. For business. For computers. Or for the Internet. These are passions we share. Frequently.

Our goal is to feed your passion with the greatest magazines, web sites, and CD-ROMs imaginable.

We love to innovate, we love to have fun, and we seem to love to "passion." A lot. We have a cast-of-thousands always deliver spectacular editorial value. That means doing whatever it takes to give you the information you need. With any luck, we'll even make you smile sometimes.

Thanks for joining us. Next Generation also has passion for changing the text that the marketing people give us if it gets in the way of the section that's usually put funny text in. See above this box for more funny little text.

NEXT GENERATION



96

TOMB RAIDER III

In issue 44, **Next Generation** named *Tomb Raider III* as one of the letdowns of E3, but we're perfectly happy to be proven wrong. It seems it's possible to love Lara for her brains too, since under the game's familiar surface lies a highly tuned, supremely satisfying action/exploration experience. Turn to page 96 for the full review. But Lara has a few secrets she's been keeping from you — in fact, so has every character and game ever made. How do game designers get away with cheating? The story begins on page 74



82

WHAT HAS MARIO DONE FOR GAMING?

In the years since Mario 64 was released, many of the innovations it pioneered have yet to be surpassed. Why is that?



74



88

ERIC HAMMOND

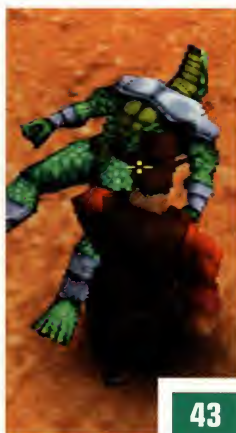
Sega's VP of PD seems uniquely suited to the task of bringing a new system's software to market. This month, he adds another notch to his belt with the **Next Gen** interview



08

INTELLIGENCE

Dreamcast debuts at the Tokyo Game Show • **Next Generation** sorts PlayStation 2 fact from fiction • The ISDA throws a party for charity • Plus, all the usual columns



43

ALPHAS: 15 games previewed

Every month our crack staff sifts through the hundreds of games in development and brings you the goods on the most interesting picks of the litter, including Duke Nukem's return to N64



95

FINALS: 22 games reviewed

This holiday season gamers have a good crop of titles to choose from, including Lara's return in *Tomb Raider III* and Square's *Xenogears*. There's still some clunkers though, so read on

08

ANALYZING

Intelligence

Gaming news and analysis, including:
 12 **Movers & Shakers** (business news)
 14 Arcadia (coin-op news and updates)
 16 In the Studio (breaking titles)

20

NG JAPAN

Big in Japan

A chat with the creators of *Silent Hill*

25

DREAMCAST

Dreamcast preview

All the latest on Sega's soon-to-be-released superconsole — six pages of it in fact

43

NG SOFTWARE

Alphas

The best and brightest of what's coming next

44	Duke Nukem: Zero Hour	Nintendo 64
46	Hired Guns	PC
50	Shogun	PC
54	Wheel of Time	PC
59	Street Fighter Alpha 3	PlayStation
60	TOCA 2	Multi
62	Syphon Filter	PlayStation
65	Shogun Assassin	PlayStation

74

NG SPECIAL

Trick or cheat?

Choosing between reality and what a processor can handle takes skill. Here's how it's done

82

NG SPECIAL

What did *Super Mario 64* ever do for videogames?

The 10 Commandments of 3D games

88

TALKING

Eric Hammond

From the man who did *One on One*: Dreamcast

95

RATING

Finals

So many games, so little time

96	Tomb Raider 3	Multi
98	Silicon Valley	Nintendo 64
100	Grand Prix Legends	PC
102	Xenogears	PlayStation

111

NG RESOURCES

Advanced strategies

The inside word from those who made the games

122

ENDING

Next Generation brings you down easy with tidbits from our readers and highlights from the past

122	Retroview	Taking a look back
124	Letters	We love our readers
127	Next Month	NG 50 on sale 01/19

Dreamcast dominates the Tokyo Game Show as Sony launches PocketStation and **struggles to find new material**

INTELLIGENCE

Game industry news and analysis

TOKYO GAME SHOW

Dreamcast Comes Out Fighting

The Tokyo Game Show, held last month in the cavernous Makuhari Messe halls, was a source of both joy and consternation. It marked the triumphant return of Sega, who pulled out all the stops to convince us all that Dreamcast is surely going to be the Next Big Thing. That was the joy. The consternation was the result of a pathetic Sony presence, the virtual absence of Nintendo, and the fact that originality in the established console market has diminished to a mere trickle from the blue-chip publishers Namco, Capcom, and Square. We can only hope, of course, that the slowdown is the result of still-secret Dreamcast development.



SEGA

As expected, the Tokyo Game Show belonged lock, stock, and barrel to Sega, who dominated the main hall. On the tangerine orange stand, Japanese game press fought over playable versions of *Sonic Adventure*, *Virtua Fighter 3tb*, *Blue Stinger*, *Godzilla Generations*, and *Pen Pen Tricelon*, with the biggest squeeze to be found in front of an almost arcade-perfect conversion of *VF3tb*. With the exception of the slightly less detailed character models, Sega faithfully reproduced its Model 3 hit, with smooth framerates and pixel-perfect backgrounds.

And what of the blue hedgehog? Sonic was never the star in Japan that he was in the West, but once they finished with *Virtua Fighter*, delegates made a beeline for *Sonic Adventure*, which impressed on every level. Everything you've seen and heard about this game is true. It moves

smoothly, the textures really are that detailed, and the character models are as complex and beautifully constructed as the early screenshots suggested. The demo stations were limited to one character/level each. Not surprisingly, the most popular, and most interesting, proved to be the Sonic level, with varied gameplay that combined *Crash*-style leaps and bounds with *F-Zero* tunnel and freeway speed sections.

The game's creator, Yuji Naka, has faithfully transferred the essence of the original *Sonic the Hedgehog* into 3D — eschewing the Nintendo's beloved extended exploration in favor of speed and seat-of-your-pants action. Whether this strategy will prove popular in the long run remains to be seen, but it was perfect fare for the pressure-cooker atmosphere of the Tokyo Game Show, where demos were limited to a few minutes per person.



The Dreamcast stand was the main attraction, showcasing Sega's key titles (and a few not-so-key titles) in the run up to the November 27th launch date. There was little competition from Sony

Trying not to clash with Sony's PocketStation razzmatazz happening opposite, Sega staged a number of video presentations that mirrored its New Challenge Conference demo. Perhaps the most interesting of these involved Naka giving the crowds a guided tour of *Sonic Adventure*, revealing a fully realized fishing subgame and throwing some light on how the VMS will work with Sega's premier title. *Sonic* raced around a large room filled with various creatures, mixing and matching pairs, presumably for a Tamagotchi style breeding program. One perhaps for the Japanese gamers.

Drawing the third-largest crowd was Climax Graphics' *Blue Stinger* action adventure. Despite some camera problems (obscuring alleyways and enemies), this impressive-looking title won over the press with some truly amazing lighting effects and character models that looked every bit as good — if not better than — Sega's own VF3tb. The character's faces are especially good, with rounded features and smooth texturing, amply demonstrating the power of NEC's chipset.

The biggest disappointment was *Sega Rally 2*. Once again, Sega



Sonic Adventure proved popular with attendees, but was somewhat overshadowed by Virtua Fighter 3tb, which drew huge crowds

which, despite running smoothly and showing off a detailed environment engine, had little else to offer. There were no action sequences, no enemies, and little to look at other than rapidly scrolling scenery.

Climax Entertainment introduced the system's first RPG — *Landers*. Though only running on a handful of monitors, it was payable, if a little glitchy. Like *Blue Stinger*, the game is fully 3D and features superbly detailed characters and interiors — both underlining the texture power of Dreamcast as well as the obvious rendering muscle.



the graphics. It may look as if the entire world is made of cake frosting, but the smooth and colorful characters combined with a slick framerate (even during two-player split-screen) impressed.

Godzilla Generations left many wondering what all the fuss was about, offering little more than repeated opportunities to crush buildings in downtown Tokyo. Fun for a while, but it soon became tedious.

Also on the stand were *Sengoku Turb* and *Seventh Cross* from NEC; an RPG called *Evolution*,

WHAT IS IT?

In order for Atari to legally saturate the arcade market, they had to start a completely independent operation to produce Atari-like games under this name.

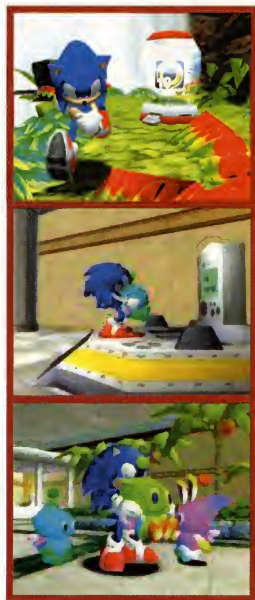
Sega succeeded in winning over its audience, but matched every hot title with an equally disappointing one

showed only video footage of the Windows CE-powered racer, which set off alarm bells for the press, as it was only six weeks before the title ships. (It was later confirmed that *Sega Rally 2* will slip. See page 27.) The same was true of SOA's Christmas contribution, *Geist Force*,

There were, of course, some disappointments. General Entertainment's *Pen Pen Tricelon*, despite attracting significant crowds, was a little too quirky for **Next Generation's** taste, providing a strangely subdued racing experience. Yet mention must go to

Ubi Soft's *Monaco Grand Prix 2*, Fortyfive's *July*, Warp's *D2* (shown on video only) and a *Virtual-On*-style game that Sega chose not to name. An underwhelming, though competent, conversion of PC shooter *Incoming* was also playable, along with video of Sega's arcade-perfect *Get Bass*.

So how convincing was this display? Sega succeeded in winning over its audience, but matched every hot title with an equally disappointing one, causing some to comment that the launch felt a little rushed. In its haste to prove third-party support for Dreamcast, it may be that Sega lost sight — just for a second — of its goal: To amaze the public and press with its superior technology. It did that, but by the end of the first day, the message was beginning to feel a little diluted. Japanese gaming eccentricities aside, **Next Generation** would have preferred to see only the very best titles on the Sega stand. Sony, however, had little to offer in response.



Sonic creator, Yuji Naka, demonstrated the distinctly Tamagotchi-esque elements of Sonic Adventure to a slightly perplexed crowd



(Clockwise from top left): The mystery robot game (thought to be a new Virtual On), the delayed Geist Force, and two shots of Landers — one of the most impressive games of the show

SONY

Offering a stark contrast to Sega's abundance, Sony's stand offered just two games, illustrating the yawning gap that exists between Sega, a company that has one of the strongest in-house development outfits in the world, and the PlayStation's parent — bereft of new ideas and still struggling to find the required talent from within. Unless, of course, you describe the all-too-familiar *Crash Bandicoot 3* and an expanded

Intelligent Cube, *Intelligent Cube Final*, as groundbreaking. The lack of titles gave Sony's enormous booth a ridiculous air, with the giant stage serving only as the backdrop for its official launch of the PDA, now branded PocketStation.

Despite many games at the show claiming some kind of compatibility with the tiny handheld, Sony showed nothing of the system's functionality, or how it might be used with the top titles. The PocketStation is obviously a big deal for Sony in Japan, which explains the fanfare, but it was still a poor replacement for playable titles. For those, you had to look to Namco, Square, Capcom, and Konami.



Sony had little to offer at the show in the way of games. Instead, the PocketStation (PDA) took center stage

IT IS ...

Kee Games, named after Joe Keenan, a close friend of Atari's founder, Nolan Bushnell.

NAMCO

Quality over quantity has always been Namco's style — a fact underlined by a solid lineup at the show. Drawing by far the largest crowds, *Ridge Racer Type 4* dominated the stand and impressed everyone with *Gran Turismo*-style graphical detail and its trademark powersliding gameplay. Looking

past the racer, however, revealed *Libero Grande*, a soccer game that offers two firsts: Split-screen play and a selectable first-person perspective. Also on display were *Star Axiom*, *Smash Court Tennis*, and *RPG Tales of Phantasia*. There was no mention of the previously announced support for Dreamcast.



Namco wowed the crowds with *Ridge Racer R4*, and demonstrated its latest piece of gear: the JogCon controller



SQUARE

Despite having one of the biggest booths in the hall, Square had nothing new to offer. *Final Fantasy VIII* was playable on what seemed like hundreds of machines, but because the demo had been available for months on the *Brave Fencer Musashi* disc, the game drew less interest than other new games. The usual array of

Chocobo-related titles were also in evidence, with an RPG and *Chocobo Racing 2* trying hard to impress, while the crowds stared in wonder at the astoundingly good intro sequences to Square's latest fighter, *Ehrgeiz*. In-game, the characters looked superb, and the action was fast paced, though considering the less-than-expected sales of *Tekken 3* recently, the prospect of yet another fighting game for PlayStation failed to whip up much enthusiasm from the crowd.

Final Fantasy VIII took the lion's share of Square's giant stand, along with *Ehrgeiz* and *Chocobo Racing 2*

NEWS BITES

More and more publishers are offering games direct to consumers via an online site. But the chances are that the natural cost savings publishers make from selling direct will not be passed onto the consumers. While publishers would love to offer this benefit, it would ruin their relationships with brick-and-mortar retailers. Rumors have surfaced concerning the current whereabouts of former Probe chief and industry legend...

Fergus McGovern. Word is that he's setting up a development house called Trillion that is working on a secret low-cost online gaming solution. 3DO has reported losses of over \$7 million and has lined up loans of up to \$60 million. Trip Hawkins, the company's chairman and chief executive officer, says he's not concerned. "Our spending has increased with our planned expansion of our internal studios and marketing plans for our remaining 11

new product releases," he said. "The quality of these new releases will demonstrate that our strategy of making only the best games is working." Meanwhile, the company with the most problems on its hands right now is Interplay. The firm has laid off up to 50 people, merged at least two internal operations, cancelled high-level projects, Vulcan, and lost \$15 million for its most recent quarter, with warnings of more

losses on the way. If your favorite mind game is making sense of Microsoft's moves in the game industry, add this to the conundrum: The firm has bought a stake in online game developer VR-1. VM Labs has unveiled the official name and logo for its Project X console. In the grand tradition of crap names for good game technologies, the firm has named its baby NUON. Real snappy, guys. We won't even start on the logo. The sequel to Banjo-

CAPCOM

Only one game mattered at the show for Capcom — the latest installment in its terminally long-running series of 2D fighters, *Street Fighter Alpha 3*. Costumed stand-ins of game characters stalked the show floor, to the delight of the Japanese press, who posed with their heroes while cameras flashed. Due out on PlayStation in December, *Alpha 3* looked as good as its arcade double, with the exception of a few frames of animation. Because *Alpha 3* is also compatible with the PocketStation, players will be able to download fighters, train

them on the handheld, and upload them back into the game. There was also talk of a Dreamcast version, though that remains unconfirmed.

Also represented (though clearly a poor second to all things *Street Fighter*), were *Vampire Savior EX*, *Magical Tetris* featuring Mickey for N64, *Marvel Super Heroes vs Street Fighter* for Saturn, and finally, *Capcom Generations 5* — essentially a collection of, you guessed it, *Street Fighter* games that includes the original plus the Champion and Turbo editions.



Capcom's stand was popular, but ultimately uninspiring

KONAMI



Konami had a great mix of titles. *Castlevania* (one of the few N64 games at the show) looks to be shaping up nicely

The biggest draw on Konami's stand was the arcade hit *Dance Dance Revolution*, but there were others worth notice. *Silent Hill* for PlayStation looked good — the realtime, atmospheric *Resident Evil* clone displayed some suitably scary monsters and enough technical prowess to impress. *Castlevania* was on the stand in playable form and went down well with visitors. Konami has done a good job transferring the whip to 3D and the environments are huge. The real niggle is that the character model for Belmont is overly simplistic and still poorly textured.

Initially promising, Konami's other N64 title, *Hybrid Heaven*, disappointed. The admittedly still-early version appeared slow paced, poorly textured, and empty, trading

realtime combat for a turn-based RPG approach that meshes badly with the 3D exploration. Accordingly, the demo systems were left virtually untouched by showgoers.

Konami also introduced its horror game/fighter *Japan* (now called *Shogun Assassins*, see page 65) — a cross between *Tenchi* and *Resident Evil*, which looked like it could be a title to watch for 99.

Gensou Suikoden 2 was also on display, along with fighter *Bug!* and *Beat Mania* for PlayStation — cashing in further on the current Japanese obsession with dance titles. Though not without its faults, Konami's stand was perhaps the most interesting of the show, demonstrating a willingness to experiment that was absent from Capcom and Namco's hit factories.

SIZE DOES MATTER

Sega's Dreamcast was not the only hardware making waves at the show. SNK introduced its Neo Geo Pocket system with *King of Fighters* and Bandai launched its own handheld, WonderSwan. The Neo Geo Pocket (see **NG 47**) was the gamer's pick, thanks to the software and to the revelation that the system will be available with a color display as well as the standard monochrome. This version was only available behind glass but drew the crowds nevertheless. The Neo Geo Pocket will be available in Japan by the time you read this and has built-in compatibility with Dreamcast, linking to the system via Dreamcast's expansion port.

Bandai's effort was less appealing in terms of titles, but it carved a niche for itself by offering limited FMV playback on the relatively hi-res screen (224x144). Quite how this will be used remains unclear, but it's possible that some kind of TV receiver could be provided as an add-on to the system, turning the handheld into a portable TV.

The WonderSwan can be played with the screen turned horizontally or vertically and will ship with ten titles. It will retail for ¥4800 (\$50). Bandai claims they will sell 4 million WonderSwans in 1999, bridging the gap, between the likes of the PocketStation and fully fledged game systems like Game Boy Color and Neo Geo Pocket.



Bandai's WonderSwan (top), and Neo Geo's Pocket (above) were both on display

THE BEST OF THE REST

Of the hundreds of other games at the show, the following caught the discerning eye of **Next Generation**: *Dragonquest VII* from Enix looked near completion, though its somewhat dated graphical style (using sprites with a realtime environment engine) was a little disappointing on playing. *WinBack* from KOEI is shaping up nicely and drew some interest. It does, however, seem to be teetering on the knife-edge between *Mission Impossible* and *Metal Gear Solid*. Finally, the soon-to-be-released *Destrega* was in constant demand and could yet provide the rarest of gaming experiences — an original take on the 3D fighting genre.

NG



Dragonquest VII looked dated

Kazuoie, Banjo-Toonie, will not be released until the end of 1999, at the earliest.

Arcade creativity is in such a state these days that execs are turning to home games for inspiration. Ferris has announced a deal with Activision and Blue Byte that will see *Extreme Assault* and *Heavy Gear II* appearing in arcades. **Sony Music Entertainment's Senior Managing Director, Kazutoshi Shirasahi, says he expects worldwide shipments of**

PlayStation to reach 21 million units for its current financial year. That compares with 19.3 million units for last year. **Least surprising game-delay of the year?** *Dungeon Keeper 2*. **Responding to news that the online demo of his Railroad Tycoon II had been hacked with 3D maps available online,** PopTop's Phil Stenmeyer commented, "It's a nice vote of confidence from the hardcore community." Frankly, that kind of cool is frightening. **Crack Dot**

Com is no more. But its legacy is a lively available 3D engine available for download on the Web. There are 15 gorgeous pieces of music, 100 cool sound effects, and over 2000 hi-resolution textures," explained the firm's Dave Taylor. "It's an ultra-modular outdoor 3D engine, and it does way more than *Battlezone* or *Uprising* ever came close to. You should definitely check it out if you've ever wanted a public domain, competitive outdoor 3D

engine." **For a mere \$10 you can purchase a novel based on The Legend of Zelda: Ocarina of Time.** It's called *Pathways to Adventure* and was written by Jason Rich. He explains, "What makes this concept different from other licensed game novels is that, as someone reads the story, they'll discover valuable gameplay strategies and secrets that will actually help them beat the game." Or, you could always read a tips book.

MOVERS AND SHAKERS

by Colin Campbell, *Next Generation's* international correspondent

CONTACT FRENZIES

Each year my contact book becomes ever more loaded with scratched-out names. At about this time of the year I go through, from Aardvark Software to Zed Games, and scratch out the people who are no more.

They are the lost souls — people who once worked for (and believed in) companies that have either been reduced to mere "brands" or simply buried. I can look under Virgin and MicroProse and Broderbund and find the gravestones of scratched-out contacts. This time next year, there will be a few more names scrubbed away. Why is this happening? Consolidation — and it's the next big thing. To play in the market these days you need five things: Sales of about \$1 billion a year; a global presence; homegrown and recognizable brands that actually make the company worth more than the sum of its parts; a lively, hungry management structure; and a plan.

Companies that don't have these things are stuck on the shelf. It's fair to say that 90% of companies operating in the publishing arena are permanently "for sale" to the other 10%.

EATEN ALIVE

So if that's the natural order, why hasn't consolidation actually happened? Why do we still have second-, third-, and even fourth-tier operators in the games publishing business?

The answer is complex but can be boiled down to this: Many companies are getting by with a few hits a year. But they've failed to implement a fallout plan. Too many cost-saving contracts with out-of-house developers have left them with no natural reservoir of development talent to boost the company's worth. Too many crass second-rate licenses can easily be commercially flattened by bigger, better names (this is especially true in the sports market). There are too many entrepreneur owners who won't cash in their life's work for something as trivial as actual market worth.

The recent Virgin Interactive buyout illustrates the point. The company, once scrutinized by a potential buyer, turns out to be mainly fat, with just one or two juicy morsels (*Westwood*, *SuperBikes*) buried within. The big players are getting picky about what they buy. The result is that more companies are destined to be torn apart rather than bought wholesale.

CRITICAL MISS

The mass-market was identified by some companies as merely a way to sell *more* games. It turns out to have been a way for smart people to sell *different* games. GT and Hasbro — two relatively new game publishing superpowers — have proven that our mission as an industry was not to persuade the public to like our products, but rather to make products that the public would like (*Frogger* and *Deer Hunter*).

If that fact depresses you, join the club. But it remains a fact.

Large companies have made cheap products, piled them high, and sold large numbers of them. And they've raised the stakes across the board by paying the big bucks for TV advertising.

Does it mean the end of good games? Perhaps. But here's a last thought. How many publishers operated in this business in 1988? And how many truly great games were produced in that year a decade ago, compared with today? I'd say the difference in publisher numbers is far greater than the difference in "great game" numbers. If consolidation automatically means the end of creativity, we'd have surely given up gaming years ago.

And if we'd done that there would be no platform from which to launch the present mass-market push. *Deer Hunter*, big money spent on TV ads, publishing superpowers, high development salaries — all the end result of your loyalty to (and love of) gaming through the years. Does that feel weird to you as well?

PLAYSTATION 2 EXPLODING THE MYTHS

Next Generation has learned new details about **Sony's next system**

As the PlayStation 2 announcement nears, the rumors are starting to fly. Unfortunately, as anyone who has any familiarity with the Internet knows, most rumors are dead wrong. **Next Generation** spoke with several reliable sources, questioning them about the most popular rumors in an attempt to separate outright fiction from plausible fact. The following report is a distillation of our findings.

Name

Don't expect Sony to jettison the PlayStation name, the way Sega discarded Genesis. According to statements by Sony insiders, there is "just too much equity in the brand" to lose the PlayStation name. The company has already reserved the URLs for playstation2.com and playstation2000.com

System Power

According to one developer who has seen the system running, "it looks very, very good. It's clearly very early, and the stuff I saw running was rough, but you can definitely see the power there." As powerful as the 10 million polygon per second rumors of a couple of months ago? Probably not. According to another source, PlayStation 2 should be able to deliver around 4.5 million polygons a second, making it about 50% more powerful, on paper, than Dreamcast.

Rumors that the system will use NURBS, rather than polygons, as its main 3D technology haven't been confirmed and could be a red herring. "It would be pretty stupid," said a developer who has not yet seen the system. "Everyone's got the art pipeline in place to do polygons, and to switch to NURBS at this point would add six months to every game's development cycle." Even if PlayStation 2 does use NURBS, they are likely to be tessellated to polygons before being drawn onscreen, since the hardware to draw NURBS to the screen in realtime is currently too expensive for a retail product.

Developer Reaction

"You hear a lot about how all the third parties hate Sony," says one developer, "but that's a business thing. I think at the technology level,

the company developed a system, showed it to their top six developers, got their feedback, and put it in. It has everything a developer could want."

Backward Compatibility

The market for PlayStation games is so crowded today that making the machine backward compatible may make publishers afraid of competing with hundreds of budget titles and therefore wary of the new system.

Two new pieces to the backward compatibility puzzle have been added by insiders: The possibility of dual-format games that run on PlayStation but feature graphic enhancements when running on PlayStation 2; and the possibility that older PlayStation games may get an automatic graphic boost, similar to the one provided by *Psyke* running on a 3Dfx card (**NG 47**), when running on PlayStation 2. The bottom line? "They can do it," says a developer with knowledge of the PlayStation 2 development effort, "but I'm not sure they want to."

Release Date

"I don't think Sony is in any hurry to release this thing. These are very, very patient chaps and they are not going to release it until the time is right," says a developer who, like most pundits in the U.S., expects a March 2000 launch in Japan, and a September 2000 launch in the U.S., with a European release in March 2001.

NG

HARDCORE

I was in the seventh grade when *Super Mario Bros. 2* was released. I called every store in my county, but the only store that still had it in stock was three cities away. After I produced enough drama to win Susan Lucci two daytime Emmys my mom finally broke down and agreed to take me. When got there I ran to the videogame section where the lone baby blue-colored gamepak caught my eye. Unfortunately a young boy about four years my junior was reaching for the cartridge, too. I ran toward him and elbowed his chest hard enough to make his dead ancestors bleed. He doubled over and let out a whimper, and I grabbed the cartridge and ran back to my mother at the front of the store.

— Mehrdad Modjtahedi

Have a hardcore story? Send it to "hardcore@next-generation.com"



Only Eidos challenges your imagination!



www.eidosinteractive.com

© 1998 Square Co., Ltd. All rights reserved. Final Fantasy and Square Soft are registered trademarks of Square Co., Ltd. ION STORM, DAIKATANA, HIRO MIYAMOTO, SUPERFLY JOHNSON and MIKURO IZUMI are trademarks and logos are trademarks of Ion Storm, L.P. All rights reserved. © 1998 Jon Storm, L.P. Thief: The Dark Project is a trademark of Looking Glass Studios. © 1998 Looking Glass Studios. Tomb Raider III and Lara Croft are trademarks of Core Design. © 1997-1998 Core. Eidos Interactive, Commandos and Revenant are trademarks of Eidos, Plc. © 1997-1998, Eidos. All rights reserved.

EIDOS
INTERACTIVE

ARCADIA

by Marcus Webb, editor of *RePlay* magazine

NAOMI FOLLOWUP

Of course, the big news in Tokyo was Sega's unveiling of the Naomi coin-op system, the arcade "sister" of Dreamcast. At press time, 20 top companies have confirmed they'll make Dreamcast software, and presumably many of these titles will be available in the arcade on Naomi as well. Besides the Sega titles discussed in last month's "Arcadia," it's now confirmed that Capcom will deliver a game for Naomi called *Power Stone*. And, as online readers know, Namco has also signed on to support the platform, along with Jaleco, Konami, Data East, and other top developers.

Technical and marketing details about Naomi continued to issue from Sega at the Tokyo show. As they did with their CG boards Model 1-3, Sega plans to sell the Naomi board under license to third-party game developers. In fact, Sega boldly predicts that it will sell half a million Naomi platforms, a circumstance that would, in effect, make their new system the new technical standard for arcade videos.

Naomi shares key specs with Dreamcast, such as the use of

Hitachi's 128-bit, CPUSH-4 chipset; NEC's graphic engine Power VR2; and Yamaha's sound engine SISP. Dreamcast uses the Windows CE operating program, but Sega execs in both Japan and the U.S. say Naomi does not. "Microsoft's OS Windows CE is not installed in Naomi," Sega Japan execs have told industry members there. "Naomi doesn't use any Windows platform; it employs a Silicon Graphics workstation," Sega Enterprises USA officials have flatly told "Arcadia." We hear that Windows will probably be part of the developer's toolkit given to third-party game suppliers and Naomi licensors, however.

At any rate, Sega Japan president, Shoichiro Irimajiri, has stated that Dreamcast's CD-ROM drive and modem can also be mounted on Naomi in the future, enabling arcades to download new game software. It's going to be interesting to see when and how Naomi makes use of a PDA to capture player demographics and preferences, then uses that data to beef up its individualized player marketing and link Sega arcade games, consumer games, and Internet communications into one giant package.

STOP PRESS: VOODOO3

Just as *Next Generation* went to press, 3Dfx unveiled its latest 3D technology, Voodoo3. We will have a full report next month, but for now, here are the raw facts.

The technology, which will be available both as an OEM piece and as an add-in solution, will deliver unmatched 2D and 3D performance when it is released into the first half of 1999.

Voodoo3 will be broken into two pin-compatible products, the Voodoo3 2000, designed for OEM markets, and the Voodoo3 3000, which will be for add-in cards.

According to 3Dfx, the 2000 will deliver a 250 megatexel fill rate, while the 3000 will deliver a 366 megatexel fill rate. Both parts feature a dual, 32-bit rendering pipeline, which 3Dfx claims will be able to generate more than 7 million triangles per second using a 100 billion operations per second 3D architecture.

The chipset, which is optimized for Intel's 440 LX/BX AGP chipset, will support resolutions up to 2048 x 1536, at a 75MHz refresh rate.

3Dfx says that Voodoo3 will provide twice the performance of two Voodoo2 boards in Scan Line Interleaving mode. The technology will use 3Dfx's patented single-pass multitexturing technology and should be able to deliver bump-mapping and trilinear filtering at better than 60fps in high-res applications.

The chipset supports a variety of displays, from traditional monitors, to HDTV to LCD displays. Voodoo3 interfaces directly with 3Dfx's LCDfx chip for special, sub-pixel scaling performance operations on LCD displays.

The 8.2 million transistor device will also include full MPEG-2 decoding and DVD video acceleration.

GROWING UP SAFE

Industry event raises over \$600,000 for children's charity

Until recently, it was only when faced with a common threat, like a Congressional hearing, that the game industry gathered to solve a common problem. (The solution to that political skirmish resulted in the formation of the Interactive Digital Software Association (IDSA), and the Entertainment Software Rating Board (ESRB)). On October 27, the

Foundation, the NAACP, and YMCA. CWLA Executive Director David Liederman made a heartfelt presentation before GT's Ron Chaimowitz, Acclaim's Greg Fischbach, and IDSA's Doug Lowenstein welcomed Goldstein to the stage. However most of the 600 attendees opted for the exit when country music star Ricky Van



From left to right, David S. Liederman, Executive Director Child Welfare League of America; Elizabeth Loden, Director, Protecting America's Children Campaign, CWLA; Doug Lowenstein, IDSA President; Event Emcee Liz Torres; Willie Brown, Mayor of San Francisco; Event Co-Chairman Greg Fischbach, President and CEO of Acclaim; and Event Co-Chairman Ron Chaimowitz, Chairman & CEO of GT Interactive

game industry tackled a larger issue, the safety of America's children, with its first-ever charity event.

The who's who of industry executives from around the country met in San Francisco for "A Nite to Unite — for Kids," a dinner event to raise money for the Child Welfare League of America (CWLA). The CWLA is an organization dedicated to helping America's most vulnerable children, and was rated one of the top 10 most effective and efficient U.S. children's charities by *Parents* magazine.

The event took place inside the packed Ritz-Carlton ballroom, and featured a silent auction that included donations from many of the publishers. Items up for bid ranged from sports memorabilia to animated cells from the *Sonic the Hedgehog* TV series. With donations made to a tribute book and ticket sales, more than \$600,000 dollars were raised for the CWLA.

During the dinner, Toys R Us Chairman, Michael Goldstein, was honored for his years of philanthropic service to organizations such as the For All Kids

Shelton took the microphone for the end-of-evening performance.

Considering the financial success game publishers and related businesses have enjoyed in recent years, it was high time the game industry put aside its squabbles to gather for a worthy cause. With such a positive response, it's likely an annual event of some kind will be borne out of the evening. **Next Generation** commends the generous contributions made by all the sponsors and attendees. **NG**

DATASTREAM

Number of raw, unfiltered polygons per second: Dreamcast, 3,000,000; PlayStation 2, 4,500,000; PlayStation 300,000. Number of polygons per frame, 30fps: Dreamcast, 100,000; PlayStation 2, 150,000; PlayStation 10,000. Average polygon size in pixels per frame (assume 640 x 480 resolution, 30fps): Dreamcast, 3; PlayStation 2, 2; PlayStation, 31. Amount raised by IDSA's first charity event: \$600,000. Number of PlayStation games \$600,000 would buy: 15,019. Fact: More people in the U.S. own PlayStation than own copies of Michael Jackson's *Thriller*.



OMIKRON
The Nomad Soul



**THE
UNHOLY
WAR**
OUT THINK. OUT MANUEVER. OUT LIVE.



**TOMB
RAIDER**
ADVENTURES OF
LARA CROFT **III**

Only Eidos challenges
your imagination!



**FIGHTING
FORCE 64**



NINJA
*Shadow
of Darkness*



www.eidosinteractive.com

The Unholy War and the related characters are trademarks of Crystal Dynamics. © 1998 Crystal Dynamics. All rights reserved. Tomb Raider III, Lara Croft, Ninja: Shadow of Darkness and Fighting Force are trademarks of Core Design. © 1998 Core. Eidos Interactive and Omikron are trademarks of Eidos, Pte. © 1998 Eidos. All rights reserved. PlayStation and the PlayStation logos are registered trademarks of Sony Computer Entertainment Inc.

EIDOS
INTERACTIVE

IN THE STUDIO



In the wake of the Radical Entertainment/Disney collapse (in which a financially strapped Radical lost the ESPN license) several development teams have jumped ship to form startup companies. One group, Barking Dog Studios, has set up shop in Vancouver and is already at work on an undisclosed title.

Another development group comprised of several key members of Radical's NHL hockey team, are rumored to be calling themselves Black Box (after the most-sought-after part of a plane wreck). Black Box may already have a Dreamcast hockey game in development.

Radical's closest project to

completion, *X Games Pro Boarder*, has been picked up and will be published by Electronic Arts.

Other industry insiders have informed **Next Generation** that Fox Interactive is considering launching a San Francisco-based sports studio made up of Radical employees who were working on a Major League Baseball title. If the deal goes through, the baseball project would be resumed.

And start-up studios aren't limited to the U.S. Ian Heatherington, former Psygnosis president (and founder of Liverpool, England's game-dev empire) has lured away several of Psygnosis' key creative employees, including *WipeOut*



creator Nick Bercombe. Watch this space for more details on the new company.

Just as we thought, Enix Japan's PlayStation RPG, *Star Ocean 2* (first previewed in **NG 39**) will be making its way to the U.S.. RPG fans can thank SCEA, as Sony plans on publishing the title sometime in '99.

Game developer Visual

Concepts, now part-owned by Sega, has three Dreamcast titles in the works, an NBA basketball game, an NFL football game, and undisclosed platform-style adventure. Early footage suggests the football title looks very impressive, but let's not forget that it was Visual Concepts who developed the ill-fated *Madden '96*. Of course, this time VC isn't working with 3DO legacy code, so the sweet scent of redemption may be in the air.

No Cliché (the French

developer formerly known as Adeline) has revealed some information on the company's first two Dreamcast games. The first is a mission-based driving game, tentatively entitled *Gutherman*. The second project, named *Agartha*, will be a horror

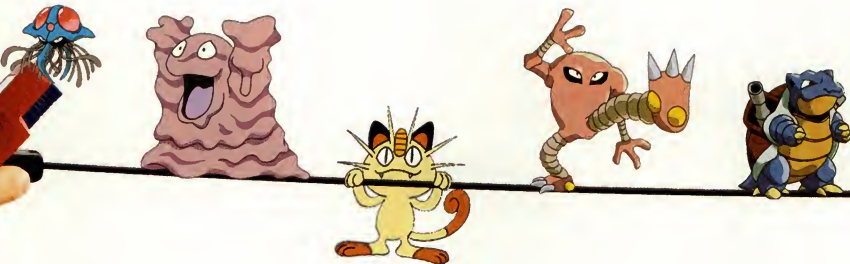


adventure with what the company claims to be an innovative control system. Considering No Cliché founder, Frederick Reynard, was involved with creation of the *Alone in the Dark* series (widely quoted as the inspiration for *Resident Evil*), it will be interesting to see if the original master still has a few tricks up his sleeve. The studio is known for quality work, its last release was *Twinsen's Odyssey* for the PC.

Glasgow, Scotland-based Red Lemon Studios, responsible for the

And To Think Some People Collect Stamps.

OK, you've started collecting Pokémon™ and you're on your way to becoming a master trainer and you want to catch 'em all. How do you do it? Grab a Game Boy® Game Link® cable, grab a friend, hook up and start trading. It's that simple. So what are you waiting for?



PROFILE

Name: Mike Mika

Accomplishments: *NFL Blitz* Game Boy, *Yar's Revenge* Game Boy

Mike Mika may not be Gumphei Yokoi's illegitimate son, but it would be hard to tell from his tight Game Boy assembly code. Among other accomplishments, he is the first person to have gotten FMV on the Game Boy Color, and he has developed techniques for displaying 150 sprites at once on the screen (Nintendo says the limit is 40).

"I did Apple II games when I was 8," Mika says, but his first "real program" was MCIDGS, a HTML-work alike [developed before HTML] that enabled Commodore 64 BBSs to display graphics over phone lines. In high school and college, he wrote several Amiga games that were published in Europe.

After college and two years of freelance development, he joined a well-respected computer and video game magazine as associate editor. "It was a lot of fun," says Mika, "but the call of development was too strong." Today he works in a converted factory space in Emeryville, CA, pushing the envelope on Game Boy development by day and "experimenting with new modes of 3D gameplay" at night.

upcoming *Braveheart* realtime strategy game, also has a first-person shooter in development for Dreamcast named *Project: TTB*. According to Red Lemon director Andrew Campbell, the title will also contain a unique strategy element.

If you're not bored of Gex yet — you may be in *Gex 3: Deep Cover Gecko*. In this latest installment, Crystal's little lizard continues to feature-chase the recently released *Crash Bandicoot: Warped*. This time Gex scuba dives, as does Crash; Gex rides on multiple animals and vehicles, as does Crash; and *Gex 3*, like *Crash: Warped*, offers

several new playable characters. So what's Gex doing that hasn't been done before? Well, our green friend has teamed up with Baywatch's Marlice Andrada, who in FMV sequences, plays an agent that Gex contacts via a video watch. Someone please wake up Dana Gould, it's time for a one-liner.

In hopes of scoring another *Tenchu*, Activision has officially added its next Japan-developed PlayStation title to its lineup. Titled *Guardian Legends*, the game was originally released in Japan under the name *Knight and Baby*. Developed by Tamsoft, creators of the *Toshinden* series, *Guardian*

Legends is an action RPG with a virtual pet twist. Players assume the role of a young knight whose quest includes reuniting a lost baby monster with its mother. During the knight's travels, the baby monster grows and accrues different abilities based on the knight's interactions with it. The game is scheduled for release in March 1999.

While it's long been known that LucasArts is hard at work on games based on the upcoming *Star Wars* film, *Episode 1: The Phantom Menace*, **Next Generation** has discovered that Atari Games is also developing an arcade game based on the film. No word yet as to what kind of game it will be, but rumor has it that at least one of the current Atari team members was also involved with the creation of the classic *Star Wars* arcade games. As history so often repeats itself, we're betting it's a vehicle-based shooter.

NG



Get Connected And
Collect Them All.



"Got Ya!"

www.pokemon.com





Ancient weapons are being unearthed for use in a brutal war without meaning or end



Stand Tall +
shake the Heavens.

Xenogears™

A young man's troubled memories hold the secret to releasing an unimaginable power



Stunning animé and giant fighting robots - a futuristic RPG like nothing you've seen



Only on PlayStation® - Only from
SQUARESOFT®

www.squaresoft.com

Published by Square Electronic Arts L.L.C.



© 1998 Square Co., Ltd. All rights reserved. PlayStation and the PlayStation logos are registered trademarks of Sony Computer Entertainment Inc. Square Soft is a registered trademark of Square Co., Ltd. Xenogears is a trademark of Square Co., Ltd. U.S. Patent No. 5,399,537; 5,499,662. The ratings icon is a trademark of the Interactive Digital Software Association.

BIG IN JAPAN

Next Generation reports from the Eastern front

Cordially invited



As predicted in **NG 45**, the new Hudson/Nintendo marriage, Manegi, will indeed spawn an original title. *Mario Party* features six 3D stages, each one themed like a giant board game, with players throwing virtual dice to progress from one board to another. Each "space" on the board carries an event or subgame, with multiplayer games (such as *Mario Kart*-style racing) for those occasions when two players occupy the same space.

The object of the game is to collect coins and stars, a la *Mario 64*, and the title will arrive in Japanese stores in time for Christmas where it will no doubt find its niche as a stocking stuffer for the seemingly ever-dwindling ranks of Japanese N64 owners. Either Nintendo has



Mario returns in the first game to come of the Hudson-Nintendo offshoot, Manegi

simply given up on the teen gamer or it's hoping that if it can just catch them young enough, all it has to do is wait, and the market will come to it. By that reckoning, we should see a enormous surge in Nintendo's user base in Japan sometime around 2010.

Going, Going, Goemon

Konami's purple-pineapple-headed hero, Goemon, is about to make his sixth outing. The snappily titled *Gambare Goemon "Dero Dero Douchu Tenko Mori"* arrives on N64 two days before Christmas, and is once again set in feudal Japan. The graphics have been

improved this time around, and the humor is, as before, decidedly offbeat. As one of the few RPGs available for Nintendo's crippled console, Konami is expecting strong sales, but if you ask us, any game released within a month of *Zelda* is going to struggle to find an audience.

SELLING BIG IN JAPAN THIS MONTH

1. Marvel Super Heroes vs. Street Fighter (Capcom) Saturn
2. Slayfers (Banpresto) PS
3. Beatmania (Konami) PS
4. Martian Story (ASCII) PS
5. Wario Land 2 (Nintendo) GB Color
6. Pocket Monsters Pikachu (Nintendo) GB
7. Dragon Quest Monsters (Enix) GB
8. Sanpagita (SCE) PS
9. Simple 1500 Series Vol.1 The Mah Jong (Culture Publishers) PS
10. Metal Gear Solid (Konami) PS



He's back: The guy with the wacky hairdo returns in Konami's distinctly oddball sequel to *Mystical Ninja*

Minitalk: Konami

Because of the success of *Resident Evil*, it seems as if everyone is scrambling to do horror-themed titles. *Silent Hill* from Konami (**NG 47**), however, is the lead contender vying for *Resident Evil*'s crown. **Next Generation** recently visited Konami Japan's development office and spoke with Director Keiichi Toyama and CG Designer Takayashi Sato.



Silent Hill Director Keiichi Toyama

Next Generation: What was the inspiration for *Silent Hill*?

Keiichi Toyama: The original concept came from the corporate side — they wanted to make an horror title. I wasn't too familiar with horror games or horror in general, so I did some research to find out what people enjoyed. Horror movies set in modern times seemed popular with the public, but to make a game like a horror movie it can't be patterned after it too closely. If the environment is too dark, for example, it won't be a good game. For cinematic parts we took some inspiration from David Cronenberg and David Lynch. Our main challenge was to build an American town and an appropriate horror image.

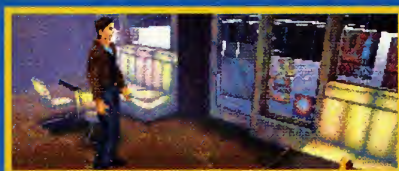
NG: What has the team done before?

KT: I worked on *Hyper Olympics*, in which I was in charge of character design and motion design. *Silent Hill* is my first project as director.

Takayashi Sato: Before this I was a student in Contemporary Art. I'm in charge of *Silent Hill*'s CG movies.

NG: The FMV is very impressive. How long did it take?

TS: It is difficult to say, but to render one second we need three or four hours. Including the modeling it is



Retaining detail in realtime has proved a challenge

much longer. If you're talking about total design I don't want to think about it. (Laughs) What I can say is that I haven't stopped working since I joined the company, and I haven't slept much, either.

NG: What game do you see as competition?

KT: Of course, there is this one title... (Laughs) From the beginning we had *Resident Evil* in mind, and we wanted to release a game with a better scenario.

NG: So what does *Silent Hill* do better than *Resident Evil*?

KT: *Resident Evil* has a kind of general Hollywood atmosphere. I think *Resident Evil 2* became an action movie type of game. *Silent Hill* is getting back to the root of what horror is. We want to scare you at a gut level.

NG: How was the experience working with PlayStation? Were there any problems?

KT: Our main problem was the lack of a Z-buffer. When we start playing with camera angles, the priority of each object is broken. With a normal action game it is not a real problem because you're not too concerned with the atmosphere and can put the camera anywhere. But with a horror game it is very important to maintain the atmosphere with good camera work.

NG: How did you come up with the story?

KT: I just let things come together. This is the first time I've directed, and I wanted it to be a team project. I wanted to let the team include their ideas from the start. **NG**



Konami's *Silent Hill* shares more than a few similarities with Capcom's *Resident Evil*, but the creators are aiming for a deeper, more involved, plot



Available at your local retail store.
Order direct at store.gtinteractive.com or call 1-800-610-GTIS

*Reject the tyranny of gravity with the power of the GEMBlade! Presenting the latest
in hoverboard technology. The tool by which you will defy all laws...
including the law of gravity! This is racing in the pursuit of pure adrenaline.
No authority. No rules. No limits. Just Streak.*



Streak, SingleTrac and the SingleTrac logo are trademarks of SingleTrac, a GT Interactive studio. GT and the GT games logo are trademarks of GT Interactive Software Corp. © 1998 GT Interactive Software Corp. All rights reserved. PlayStation and the PlayStation logos are registered trademarks of Sony Computer Entertainment Inc. The ratings icon is a trademark of the Interactive Digital Software Association. All other trademarks are the property of their respective companies.

12 dynamic interactive 3D environments



cut your umbilical cord to mother earth

streak

hoverboard racing

NEED A HINT? ☎ 1-900-CALL-2GT

(95¢ per minute, \$1.95 for fee back moped) Must be 18 years or older or have parents permission to call, touch tone phone only

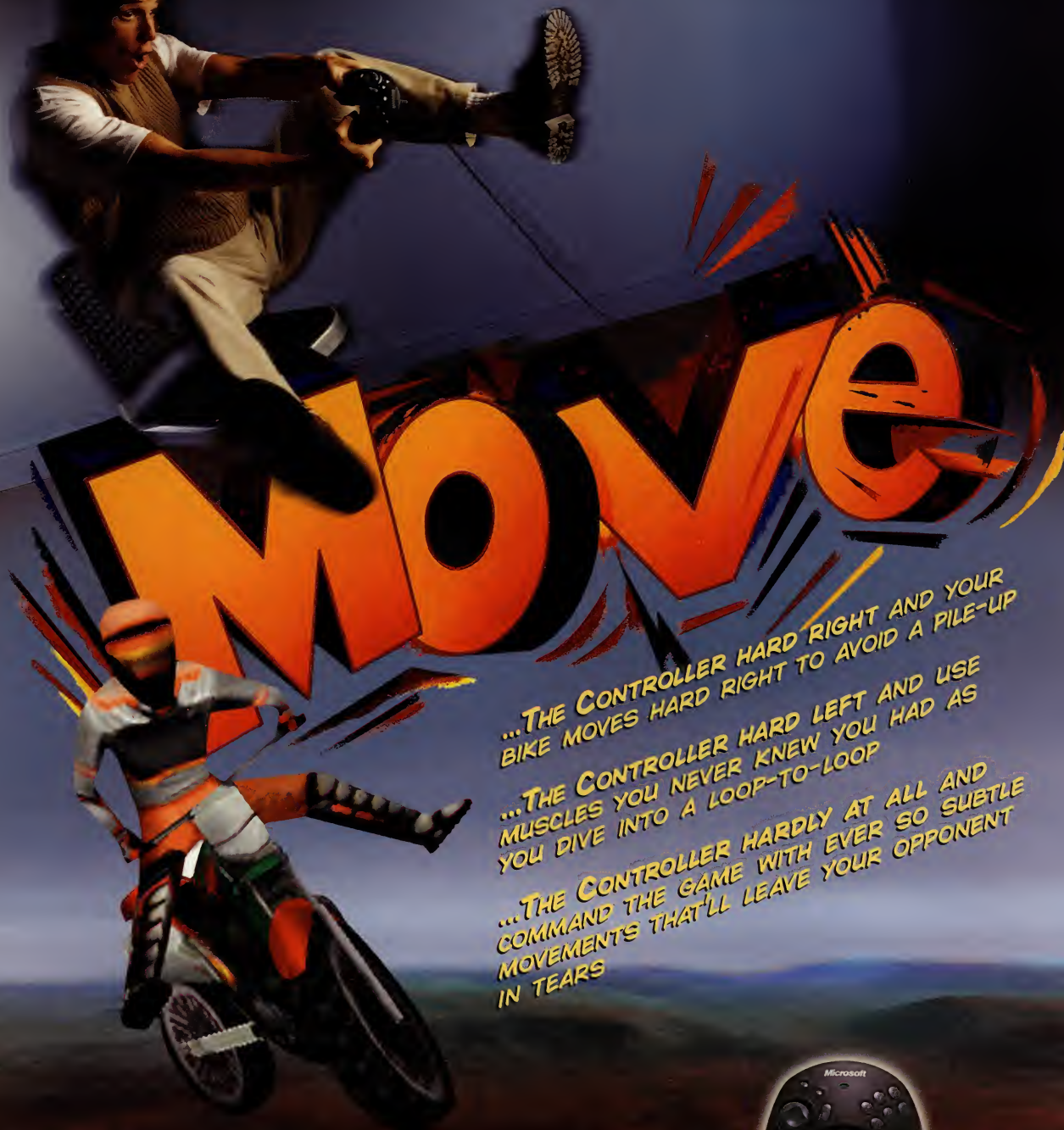
**Pull off wicked stunts:
stoke your confidence & boost your power!**

Head-to-head racing with split screen & cable link!

12 maverick Streakers. 12 bad attitudes.



Microsoft®



...THE CONTROLLER HARD RIGHT AND YOUR BIKE MOVES HARD RIGHT TO AVOID A PILE-UP

...THE CONTROLLER HARD LEFT AND USE MUSCLES YOU NEVER KNEW YOU HAD AS YOU DIVE INTO A LOOP-TO-LOOP

...THE CONTROLLER HARDLY AT ALL AND COMMAND THE GAME WITH EVER SO SUBTLE MOVEMENTS THAT'LL LEAVE YOUR OPPONENT IN TEARS

Welcome to the Microsoft® SideWinder® Freestyle Pro joystick. Now you can throw yourself into the action. Literally. Every on-screen movement is controlled with your own movement. It's called motion-sensing technology. Accurate and highly responsive, not to mention works with your favorite games. It's programmable buttons and super slick design fits your hand like a glove. Which is handy when you're throwing yourself from one side of the room to the other.

Microsoft Motocross Madness™ comes free with the Freestyle Pro.

© 1998 All rights reserved. Microsoft, Motocross Madness, SideWinder are either registered trademarks or trademarks of Microsoft Corporation in the United States and/or other countries.



Freestyle Pro

MICROSOFT

SIDEWINDER

Want more? Visit microsoft.com/SideWinder

DREAMCAST COUNTDOWN

Next Generation tracks the progress of Sega's dream machine

The clock is ticking

So now the dream is real. By the time you read this, Dreamcast will be on the shelves in Japan, *Virtua Fighter 3tb* will be selling at a 1-to-1 ratio with the system, and Sega will be frantically trying to manufacture enough consoles to meet the inevitable demand that accompanies a hardware launch.

With new titles announced almost every day, the ease with which developers can write for Dreamcast is already paying off. And by keeping abreast of events first in Japan and then, as the market emerges, in the U.S. with interviews, previews, and import reviews, **Next Generation's** Dreamcast Countdown is your window on the rapidly expanding world of Sega Dreamcast.



BIOHAZARD: CODE VERONICA

PUBLISHER: Capcom
DEVELOPER: In-house
RELEASE: Spring 99 (Japan)
ORIGIN: Japan

These new shots of what is certain to be one of the biggest Dreamcast titles of 1999 illustrate just how far ahead of current consoles the NEC-powered system is. The in-game visuals are on a par with the prerendered sequences seen in the original *Biohazard* (*Resident Evil* in the West) on PlayStation. It's not yet confirmed whether, or when this third installment of the horror classic will make it to other platforms, but snagging it first for Dreamcast was Sega's second major third-party coup. Its first? Signing Namco.



The New Face of Sega

Sega's public image is critical to the Japanese launch of Dreamcast. Tarnished by the poor worldwide performance of Saturn and the previous failure of the Genesis in Eastern markets, the company is taking a unique tack to win back its audience. The current wave of TV ads shows a

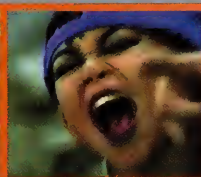
humble Sega (which, if not exactly begging for forgiveness from the Japanese public, is certainly aware of its past mistakes) and stars the now familiar figure of Sega manager Yukawa Hidekazu. The current crop of ads feature Hidekazu-san in his very own nightmare before Christmas.



Hidekazu-san meets a group of children while on a mountain. In his suit.



"Sega has changed," they cry. "Really?" replies Hidekazu-san.



"No! It's a joke!" they shout. "We don't need Sega, we want Playsta!"



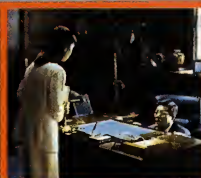
Hidekazu has been duped by demons! And he's still on a mountain.



Suddenly, the ground opens up and swallows him. He falls...



...and lands in his office, where he's been caught napping by his secretary.



"Are you okay?" she exclaims. "Yes," he replies. "I broke a nail."



Finally the Sega logo appears, and our hero lives to fight again.

Virtua Fighter 3tb

FORMAT
Dreamcast

PUBLISHER
Sega

DEVELOPER
Sega AM2

RELEASE DATE
Nov 27th (Japan)

ORIGIN
Japan



VF3tb can genuinely claim to be "arcade perfect" and is the key to the system's immediate success in Japan

POWER STONE

PUBLISHER: Capcom
DEVELOPER: Capcom
RELEASE: TBA

Not yet announced for Dreamcast (but certain to appear next year), Capcom's *Spikeout*-style fighter will debut on Sega's Naomi arcade board. The game caused quite a stir at the recent New Challenge Conference, showcasing detailed and colorful character models and fully interactive environments. Like Sega's *Spikeout*, players will be able to use found items as weapons, and even go as far as to use the scenery to beat on opponents by tearing up the lampposts and throwing the barrels that litter the Victorian setting.



Originally slated for a Saturn release, Sega wisely chose to delay *Virtua Fighter 3tb*'s conversion while technology caught up. Codenamed *Dural Project* in Japan, the original plan was to release a cart-and-disc VF3 for the aging 32-bit Saturn. The hope was that AM2 could use the extra texture memory to produce a high-res version for the home that would approximate the startling Model 3 visuals of the arcade version. No one knows how close Sega came to faithfully reproducing VF3 pre-Dreamcast, but it's a safe bet that the Saturn's limited capabilities, with or without an add-on, could never hope to get even close to the coin-op.

VF3tb, however, is as close as it's possible to get without owning the arcade machine, and it provides Sega with the killer app it needs to launch Dreamcast in Japan. Drawing huge crowds at the recent Tokyo Game Show (see report, page 8), the 80% complete version proved conclusively that Sega's latest hardware is indeed a close match for Model 3. Although the models have a slightly lower poly count (due mainly to the fact that the game was developed before the hardware, not because of any limitation of Dreamcast) the fluidity of the graphics, running in hi-res at 60fps, is startling and the texture detail (barring a few minor glitches) is pixel-for-pixel the same. The Dreamcast version also appears to be more colorful than the coin-op, thanks to the superior color reproduction of the NEC chipset. The only drawback of the home version seems to be the extended load times between stages — a fact that didn't seem to bother showgoers one bit.

All the characters from the arcade version are present — with a number of new attacks to boot. Inspired by the hugely popular SNK title, *King of Fighters*, the Team Battle mode enables you to select three

characters before starting the matches that form your team for the duration of the bouts.

At press time, Sega remains tight-lipped over the exact nature of the new features, though it will be releasing its Arcade Stick with the game, which provides for VMS score saves.

By the time you read this, VF3tb will have doubtless launched Dreamcast into orbit in Japan, and though it won't be available here until the U.S. launch in September 99, fans of the series are in for a treat — for the first time in what seems like forever, the term "arcade-perfect" will mean mean exactly that.



VF3tb will ship with a sneak preview of Yu Suzuki's eagerly awaited "Project Berkeley" a.k.a. VF RPG

Sega Rally 2

At the Tokyo Game Show, VF3tb left **Next Generation** in no doubt that even early Dreamcast software, developed before the console's hardware was finalized, could be a close match to the power of its Model 3 arcade board. *Sega Rally 2*, however, made Sega's new technology look like a distant cousin to its coin-op workhorse. Clearly unhappy with the Windows CE port of the racing title, Sega chose not to provide a playable version at the show — opting instead for a video.

Unlike VF3, *Sega Rally 2* was ported first to the PC and from there to Dreamcast, perhaps to demonstrate the ease of porting. Unfortunately, the original arcade-to-PC port wasn't that great, and reports suggest that Sega is unhappy with both the look and feel of the game. Despite their texture detail, the car models look oversimplified, and the framerate is well below the smooth 60fps characteristic of Sega's arcade division and other Dreamcast launch titles. Last-minute work may be why Sega recently confirmed that *Rally* will slip to January 14th — six weeks later than was originally planned.

When *Sega Rally 2* does arrive, however, it will offer



These recently leaked shots are from Sega's new, improved version of *Sega Rally 2*. It will slip, though



Sega is evidently unhappy with the Windows CE version of the game ported over from the PC

three play modes — Arcade, Championship, and Time Attack, as well as a modem option for multiplayer network games. This last feature makes it the first title to take advantage of Dreamcast's Internet gaming features for head-to-head play. Six cars will be offered initially, (there will be some hidden ones as well, of course) including the Subaru Impreza 555, Fiat 131 Abarth Rally, Peugeot 205 Turbo 16, Mitsubishi Lancer Evolution IV, and the familiar Toyota Celica GT Four. The racing stages will be the same found in the arcade version, but with changeable weather and time-of-day options — 40 different combinations in all. Every bit as challenging as the courses, however, will be Sega's fight to differentiate *Sega Rally 2* on Dreamcast from the PC version that so obviously spawned it. If, on January 14th, Sega releases a game that it isn't 100% comfortable with, do not expect *Rally 2* to join the U.S. launch library.

FORMAT
Dreamcast

PUBLISHER
Sega

DEVELOPER
Sega

RELEASE DATE
Jan 14th (Japan)

ORIGIN
Japan



The car textures are reasonably detailed, but it isn't arcade perfect

Evolution

Due to ship well before *Landers*, Sting's realtime RPG looks promising. Pitched a little younger than Climax's offering, *Evolution* features typically cute Japanimation-style characters and takes place in a detailed and colorful interpretation of 1930s America. Sting is keeping the gameplay simple, opting for *Zelda*-style realtime combat and an innovative (though tough to pull off) feature: randomized dungeon maps that create a unique level each time you play.

Taking a leaf out of Square's book, Sting has chosen to theme the names of the characters — eschewing *Final Fantasy*'s meteorological references in favor of weapons. The hero, Mag Launcher, teams up with Gre Nade, Linear Cannon, and Pepper Box to uncover the remains of a lost civilization. Just weeks from completion, *Evolution* won't set the world on fire, and is unlikely to see U.S. release, but its colorful approach to the genre should win over the younger gamers, while simultaneously gathering RPG fans.



Colorful characters and accessible gameplay should ensure *Evolution* a broad audience on release

FORMAT
Dreamcast

PUBLISHER
Sega

DEVELOPER
Sting

RELEASE DATE
December 23rd (Japan)

ORIGIN
Japan

Monaco Grand Prix

FORMAT
Dreamcast

PUBLISHER
Ubi Soft

DEVELOPER
Ubi Soft

RELEASE DATE
January 1999 (Japan)

ORIGIN
France

Despite its obvious graphics prowess, few U.S. players were completely taken with the Model 3 racer *Super GT*. Ubi Soft hopes that the open-wheel racing of *Monaco Grand Prix* will use the similar power of Dreamcast to bring home a deeper — not just prettier — racing experience.

It's worth noting that Ubi Soft hasn't started from scratch, as the team that recently finished the PC version, *Monaco Grand Prix Simulation 2*, is on the job. Players can expect the 17 tracks and a new arcade mode for Dreamcast, as well as options from the PC game, like practice, single-race, and championship modes.



According to Ubi Soft's Stephane Decroix, *Monaco's* project manager, up to 22 cars can be displayed on screen simultaneously, despite the high level of car detail demonstrated in these screenshots

GRANDIA 2

PUBLISHER: Sega
DEVELOPER: Game Arts
RELEASE: Summer '99
ORIGIN: Japan

Along with the *Shining Force* games, *Grandia* was one of the biggest-selling RPGs on Saturn. The sequel looks set to challenge *Final Fantasy VIII* for visual supremacy, with stunning realtime 3D visuals and a greater emphasis on action. Game Arts promise a huge world to explore — far bigger than its predecessor. *Grandia 2* will join Climax Entertainment's *Landers*, Sega/Sting's *Evolution*, Fortyfive's *July* and NEC's *Sengoku Turb* to provide Japanese Dreamcast early-adopters with an impressive RPG lineup.



The game will not have the FIA license (the regulatory body of F1 racing), but players will have the option of engaging in a retro scenario, not unlike Papyrus's *Grand Prix Legends*, based on classic 1950s-era F1 cars, and their incredibly difficult driving models.

While the gameplay may be similar to the PC game, the screenshots reveal significantly enhanced visuals. The cars boast a higher polygon count, although Stephane Decroix, project manager on *Monaco*, won't give numbers. Other small details enhance realism — the skies above the race track offer

distinctive cloud patterns, and on rainy race days, a dreary natural light is cast over the landscape, capturing the inclement weather like never before.

Monaco is currently scheduled for a January release in Japan. Decroix insists more modifications and enhancements will be made for the U.S. version, although currently, he's not saying what. We'll see when it comes to the U.S. later this year. Given Ubi Soft's growing experience in this genre (and the almost 100% likelihood that it will come to the U.S.), *Monaco* is a title for which Dreamcast racing fans should watch.



Solid weather effects add to the realism, but the real test, damage models on the vehicles, has yet to be shown

Geist Force



Taking its cue from Nintendo's classic *Star Fox* games, *Geist Force* is a graphically impressive shooter

FORMAT
Dreamcast

PUBLISHER
Sega

DEVELOPER
Sega of America

RELEASE DATE
December 10th (Japan)

ORIGIN
U.S.

Geist Force, the first Dreamcast game developed in the U.S., is certain to be among the Dreamcast launch titles here next fall. A forced-scroll 3D shooter in the mold of Nintendo's *Star Fox* series, *Geist Force* should provide a visual treat for gamers eager to show off what Dreamcast can do.

Like Square's *Einhandler* for PlayStation, *Geist Force* loads its geometry on the fly, streaming polygons off the disk so there is no appreciable load time — a method dubbed "noncut PASM," for Play, Action, Story, Music. Although "noncut PASM" sounds a bit like the 128-bit version of "blast processing," the lack of load times is appreciated. To avoid the feeling that your ship is pasted into the middle of the screen with the landscape rushing by — a feeling which *Star Fox* and other similar titles have rarely been able to shake — *Geist Force* will employ a dynamic camera system, switching angles when appropriate. The effect should be similar to that found in ground-based shooters like *One* or *Apocalypse*, although hopefully the developers at Sega will learn from these earlier efforts and choreograph this camera in a more fluid, less obtrusive fashion.

Geist Force plans to remedy the traditional shooter drawback — its complete linearity and corresponding lack of replay value — by offering multiple endings, although whether this will be the result of how well you



Geist Force only showed up on video at the Tokyo Game Show, and the release date was pushed back

perform as a player or simply different branching paths is unknown at press time. Lastly, the game's reliance on *RayStorm*-style lasers should offer a number of opportunities for showing off Dreamcast's library of lighting and special effects.

The biggest question for U.S. gamers should not be "is *Geist Force* coming?" (it is) but rather, how much will it change between December 1998 and September 1999?

AERO DANCING

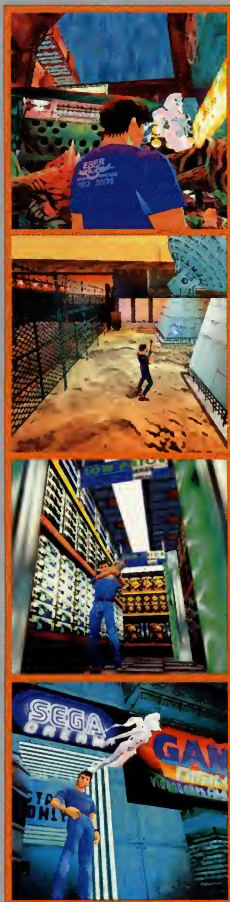
PUBLISHER: Sega
DEVELOPER: CRI
RELEASE: 1998
ORIGIN: Japan

Taking a leaf out of the *Pilotwings* book, Sega partner CRI is currently working on a stunt-jet simulator. *Aero Dancing* features a well-known aerial stunt team from Japan known as Blue Impulse (which is also the game's subtitle). With 11 different airplane models, each with its own handling characteristics. Pitched like *Pilotwings*, as an "accessible" flight-sim, *Aero Dancing* should provide a neat counterpoint to *Geist*.



Streaming the geometry from CD enables some amazingly detailed (and varied) environments

An Interview with *Blue Stinger* creator Shinya Nishigaki



Blue Stinger is already a showcase for Dreamcast — turning heads at the recent Tokyo Game Show

As a subsidiary of Climax, start-up Climax Graphics has already started making a name for itself with one of the hottest properties in the Dreamcast lineup. Previewed last month (**NG 48**), *Blue Stinger* looks to be one of the must-have titles following the system's November rollout. Boasting a smooth 30fps refresh rate and averaging 3000 polygons per character model, *Blue Stinger* provides a technical showcase for Sega's 128-bit progeny and is a vital first move in the battle to convince the public that unlike Saturn, Dreamcast will have quality third-party support. **Next Generation** caught up with the game's creator, Shinya Nishigaki, at the company's offices in Shinjuku, Tokyo to find out more.

Next Generation: Can you tell us about the games you and the team have worked on before *Blue Stinger*?

Shinya Nishigaki: The Executive Chief CG Designer previously worked at Sega on CG movies for such titles as *Clockwork Knight* and *Dark Saviour*. He also worked on sprites for Genesis titles. I worked on *Dark Saviour* as a producer and director. I was director on the NES *LadyStalker*, which was only released in Japan, and I was also in charge of the scenario and gameplay for *LandStalker* on Genesis.

NG: How many people are currently working on the project?

SN: There are 18 people in Japan and approximately 10 in the U.S. The largest part of our team is composed of designers: graphics, modeling, texture, and animation. Of course, we also have some programmers, map designers, and game designers. The U.S. team was in charge of the creature design but only during the pre-production phase. Because we were working on a 3D game this time around, we also wanted to employ a camera expert, and we used Robert Short, who won an Oscar for *Beetle Juice*, to do the creature design. He also made some 2D and 3D models for us.

NG: When did you begin work on *Blue Stinger*?

SN: We started the preproduction work in 1996, right after finishing *Dark Saviour*. We decided which platform to go with in October 1997. We started the development on Dreamcast in December the same year.

NG: What were the main influences?

SN: Movies, obviously. I have been particularly influenced by the films of Kurosawa and Spielberg, but also those of John Carpenter and Joe Dante for their focus on visual effects. Regarding games, I have been influenced by the NES version of *Dragonquest*. That was the game that made me want to work in the game industry.

NG: Was *Blue Stinger* made with the U.S. market in mind?

SN: No, that was never our specific intention. Influences from movies and visual effects from Hollywood are strong in Japan, too, so I think it will appeal to both markets.

NG: Is Warp's *D2* a competitor?

SN: Not really. Like *Blue Stinger*, it is a new genre. I played *D the Dinner Table*, and I thought it would be good to see more of this type of game on the market. I prefer to see *D2* as a partner rather than a rival, in that respect.

NG: What do you believe is Dreamcast's strongest feature?

SN: The number of polygons it can display is very important, as well as its impressive lighting capabilities. It is also very easy to develop for — there is a good support and good libraries. There are also some great sound filters.

NG: What does it allow you to do specifically, that you haven't been able to do before?

SN: Basically, we can do anything we want!



NG: But how far do you think the game pushes the Dreamcast hardware?

SN: It is difficult to say. With *Blue Stinger* we haven't used all of the capabilities of the hardware. For example, I haven't use the bump-mapping feature, but I've used the spot-lighting feature. In fact, there are always many different ways to use any hardware. Sorry — it's not a very easy question to answer at this stage.

NG: What would you say was the most difficult thing to achieve?

SN: Because it's a new hardware system, there is a kind of technical learning curve that we had to ride. The constant challenge has been pushing the realism and detail levels within the game. From the beginning, we have been pushing as hard as we can to get these aspects right.

NG: Do you have any other games in development?

SN: No. With only 18 people on staff here in Japan, we don't have the manpower.

NG



electronics
boutique®



\$44.99



\$49.99



\$49.99



\$54.99

Happy Holidays

WWW.EBWORLD.COM



129⁹⁹

Playstation Game Console
w/ Dual Shock Controller
PLAYSTATION
S.C.E.A.



29⁹⁹

Dual Shock Controller
PLAYSTATION
S.C.E.A.



14⁹⁹ EA.

Color Memory Cards
PLAYSTATION
S.C.E.A.



44⁹⁹

NBA ShootOut 99
PLAYSTATION
S.C.E.A.



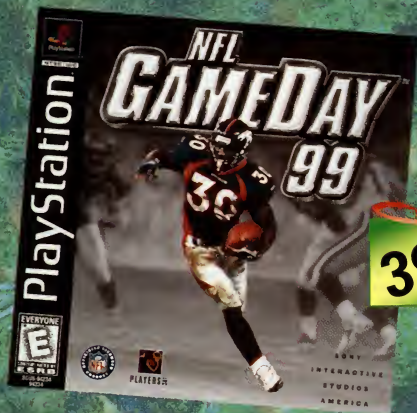
44⁹⁹

Twisted Metal III
PLAYSTATION
S.C.E.A.



44⁹⁹

Crash Bandicoot Warped
PLAYSTATION
S.C.E.A.



39⁹⁹

NFL Gameday 99
PLAYSTATION
S.C.E.A.



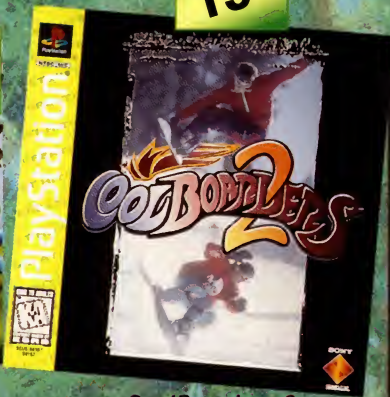
39⁹⁹

Spyro The Dragon
PLAYSTATION
S.C.E.A.



39⁹⁹

A Bug's Life
PLAYSTATION
S.C.E.A.



19⁹⁹

CoolBoarders 2
Greatest Hits
PLAYSTATION
S.C.E.A.



44⁹⁹

CoolBoarders 3
PLAYSTATION
S.C.E.A.



19⁹⁹

Crash Bandicoot 2
Greatest Hits
PLAYSTATION
S.C.E.A.



19⁹⁹

Jet Moto 2 Greatest Hits
PLAYSTATION
S.C.E.A.

PLAYSTATION®



Darkstalkers 3
PLAYSTATION
Capcom

39⁹⁹



Resident Evil Director's Cut
PLAYSTATION
Capcom

24⁹⁹



Rival Schools
PLAYSTATION
Capcom

44⁹⁹



Breath of Fire III
PLAYSTATION
Capcom

39⁹⁹



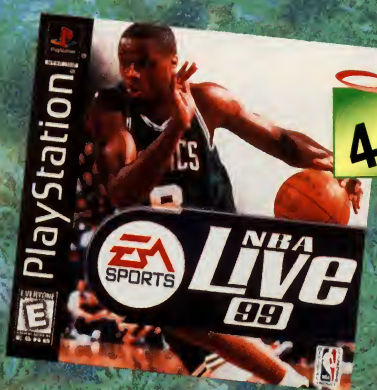
Knockout Kings
PLAYSTATION
Electronic Arts

44⁹⁹



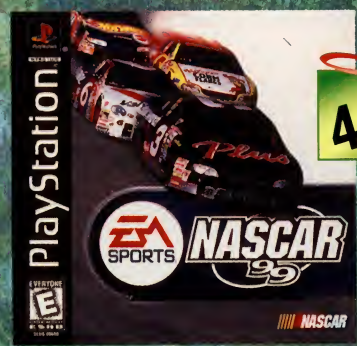
Tiger Woods 99
PLAYSTATION
Electronic Arts

44⁹⁹



NBA Live 99
PLAYSTATION
Electronic Arts

44⁹⁹



Nascar 99
PLAYSTATION
Electronic Arts

44⁹⁹



Museum Volume 1
PLAYSTATION
Namco



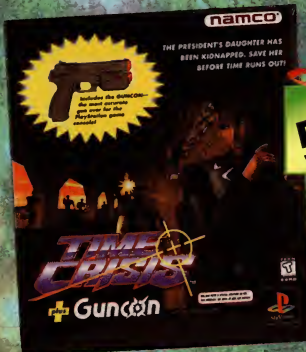
Museum Volume 3
PLAYSTATION
Namco



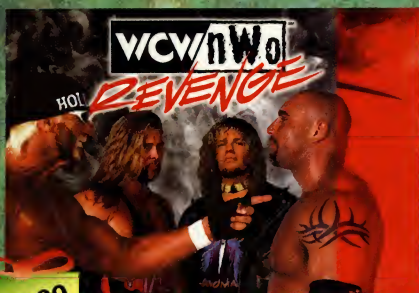
Soul Blade
PLAYSTATION
Namco



Tekken 3
PLAYSTATION
Namco



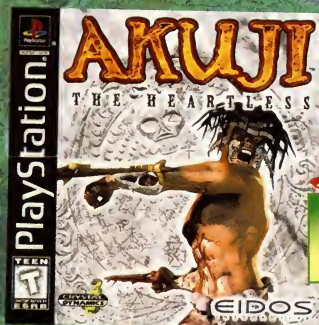
Time Crisis
PLAYSTATION
Namco



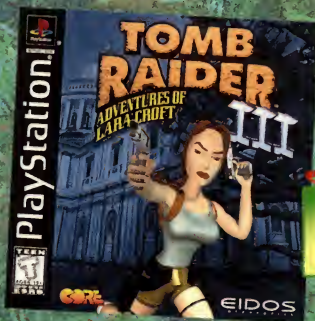
WCW/NWo Revenge
NINTENDO 64
THQ



Lunar Silver Star Story
PLAYSTATION
Working Designs



Akuji
PLAYSTATION
Eidos Interactive

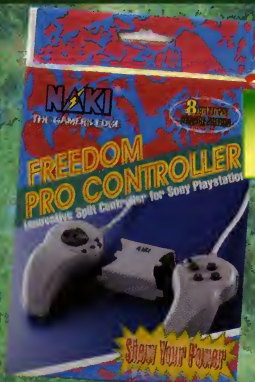


Tomb Raider III
PLAYSTATION
Eidos Interactive



39⁹⁹

Rocker Seat Massager
NINTENDO
Naki Accessories



9⁹⁹

Freedom Pad
PLAYSTATION
Naki Accessories



Link Up Cable
PLAYSTATION
Naki Accessories

9⁹⁹



Power Bag
PLAYSTATION/NINTENDO 64
Naki Accessories

14⁹⁹



14⁹⁹

Top Gun Fighter 8
PLAYSTATION
Naki Accessories



24⁹⁹

Lunar Gun
PLAYSTATION/SATURN
Naki Accessories



14⁹⁹

Fifth Element
STRATEGY GUIDE
Dimension Publishing



14⁹⁹

Tomb Raider III
STRATEGY GUIDE
Dimension Publishing



14⁹⁹

MediEvil
STRATEGY GUIDE
Dimension Publishing



14⁹⁹

Spyro
STRATEGY GUIDE
Dimension Publishing



14⁹⁹

**Super Light Boy
GAME BOY
ASCII**



299⁹⁹

**Intensor
UNIVERSAL
BSG Labs**



49⁹⁹

**Reality Vest
PLAYSTATION / NINTENDO 64
Nuby**

**229.99
- 30.00 MAIL-IN
REBATE
199.99 AFTER
REBATE**



**GX TV
UNIVERSAL
Samsung**



29⁹⁹

**Game Buddy
GAME BOY
Battery Technologies**



19⁹⁹

**Dual Force
Analog Controller
PLAYSTATION
Mad Catz**

**Also
Available
For
NINTENDO
64**



39⁹⁹

**Xploder
PLAYSTATION
USA Blaze**



12⁹⁹

**Game Grips
PLAYSTATION
USA Blaze**



12⁹⁹

**Game Grips
NINTENDO 64
USA Blaze**



Wild Arms
PLAYSTATION

24⁹⁹



World Cup Golf
PLAYSTATION
Jack Of All Games

19⁹⁹



Casper
PLAYSTATION
Jack Of All Games

19⁹⁹



Courier Crisis
PLAYSTATION
Jack Of All Games

19⁹⁹



Gex
GAME BOY COLOR
Crave

29⁹⁹



Men In Black
GAME BOY COLOR
Crave

29⁹⁹



Game Boy Wallet
GAME BOY
Smart Pouch

14⁹⁹



Pitfall 3D
GAME BOY COLOR
Crave

29⁹⁹



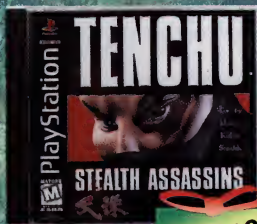
Harvest Moon
GAME BOY
Crave

29⁹⁹



Metal Gear Solid Guide
STRATEGY GUIDE
Crave

14⁹⁹



Tenchu
PLAYSTATION
Activision

44⁹⁹



Asteroids
PLAYSTATION
Activision

39⁹⁹



Pokemon
Survival Guide
STRATEGY GUIDE
Sandwich Island

9⁹⁹



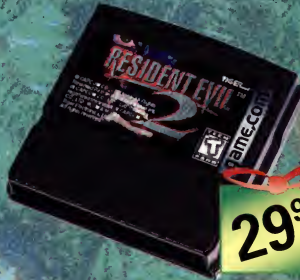
Game Boy
Survival Guide
STRATEGY GUIDE
Sandwich Island

9⁹⁹



Tiny Tank
PLAYSTATION
MGM

44⁹⁹



Resident Evil 2
GAME.COM
Tiger

29⁹⁹



Mortal Kombat Trilogy
GAME.COM
Tiger

24⁹⁹



Game.Com Pocket Pro
Tiger

39⁹⁹



Indy 500
GAME.COM
Tiger

9⁹⁹



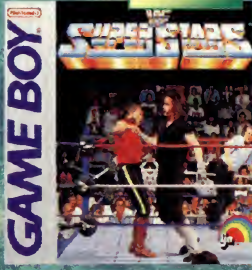
Jeopardy!
GAME.COM
Tiger

19⁹⁹



Dragon's Lair
GAME BOY
Microware

19⁹⁹



WWF Superstars
GAME BOY
Microware

19⁹⁹



Superstar Soccer
GAME BOY
Microware

19⁹⁹



Street Racer
GAME BOY
Microware

19⁹⁹



Centipede
PLAYSTATION
Hasbro Interactive

44⁹⁹



Glover
NINTENDO 64
Hasbro Interactive

54⁹⁹



Wheel Of Fortune
PLAYSTATION
Hasbro Interactive

39⁹⁹



Test Drive 5
PLAYSTATION
Accolade

44⁹⁹



**Test Drive
Off-Road 2**
PLAYSTATION
Accolade

44⁹⁹



**Brave Fencer
Musashi**
PLAYSTATION
Squaresoft

49⁹⁹



Superman
PLAYSTATION
Titus

44⁹⁹



Superman
NINTENDO 64
Titus

64⁹⁹



Titus Jr.
GAME BOY COLOR
Titus

29⁹⁹



Superman
GAME BOY
Titus

19⁹⁹

TM & © are registered trademarks of Nintendo of America. ©1998 Nintendo.



129⁹⁹

Nintendo 64 Hardware with
Atomic Purple Controller and
Standard Gray Controller
Nintendo



59⁹⁹

The Legend of Zelda
Ocarina Of Time
NINTENDO 64
Nintendo



49⁹⁹

Star Wars
Rogue Squadron
NINTENDO 64
Nintendo



49⁹⁹

F-Zero X
NINTENDO 64
Nintendo



49⁹⁹

Banjo-Kazooie
NINTENDO 64
Nintendo



39⁹⁹

GoldenEye 007
NINTENDO 64
Nintendo

39⁹⁹



Super Mario 64
NINTENDO 64
Nintendo



39⁹⁹

Star Wars
Shadows of the Empire
NINTENDO 64
Nintendo

TM & © are registered trademarks of Nintendo of America. ©1998 Nintendo.

FOR THE STORE NEAREST YOU CALL 1-800-800-5166

NINTENDO 64



Game Boy Color
Hardware
GAME BOY COLOR
Nintendo

79⁹⁹



Tetris DX
GAME BOY COLOR
Nintendo



Game And Watch Gallery 2
GAME BOY COLOR
Nintendo



Pocket Bomberman
GAME BOY COLOR
Nintendo



Pocket Pikachu
HAND HELD GAME
Nintendo



Pokemon Red
GAME BOY
Nintendo



Pokemon Blue
GAME BOY
Nintendo

Prices valid in U.S. only. Typographical errors are not the responsibility of Electronics Boutique. Not all items may appear at our outlet locations. Prices may vary in Puerto Rico and New York City locations. At time of printing, all products are expected to be available. Some packaging and special offers may differ in Canada. Prices and availability are subject to change. Manufacturers' delays are not the responsibility of Electronics Boutique. ©1998 Electronics Boutique.

Duke Nukem: Zero Hour NINTENDO 64 **Hired Guns** PC **Shogun** PC
Street Fighter Alpha 3 PLAYSTATION **TOCA 2** PC/PLAYSTATION

ALPHAS

The stories behind the games that will change the way you play



44



59



48



60



54



65

You've already returned that bargain-bin copy of *Fantastic Four* for the PlayStation that Aunt Agnes was kind enough to present you with this holiday season. Problem is, you've got what you wanted from the current holiday lineup. Well, below we've gathered some titles worth saving for.

44 Duke Nukem: Zero Hour N64
 Duke rumbles again on Mario's home turf

46 Hired Guns PC
 An amiga classic gets an "Unreal" remake

50 Shogun PC
 Realtime strategy meets feudal Japan

54 Wheel of Time PC
 Fantasy novel setting — realtime action

59 Street Fighter Alpha 3 PlayStation
 Bison and Blanka and Chun Li, oh my!

60 TOCA 2 PC/PlayStation
 A second go-round for Britain's rad racer

62 Syphon Filter PlayStation
 989 Studios take on third-person action

65 Shogun Assassin PlayStation
 Konami's new sword-slashing adventure

MILESTONES

SLAVE ZERO	PC	69
STREET BORDERS	PlayStation	69
OUTCAST	PC	70
DARKSTONE	PC	70
RUSH DOWN	PlayStation	70
METAL FATIGUE	PC	70
HYBRID HEAVEN	Nintendo 64	70



69



69



70



70



70



70

DUKE NUKEM: ZERO HOUR

Mario may never "get some," but Duke Nukem continues to spread machismo on the N64



From the spooky cobblestone streets of Victorian England (right), to the corrals of the Old West (above), the different time periods bring a unique flavor to each of Duke's dangerous levels



Never has a system been more deprived of testosterone than Nintendo 64. Its happy character line-up is crowded with prepubescent heroes and unisex mascots. Few stand out as "men for the job"—*GoldenEye*'s Bond, *Mission Impossible*'s Ethan Hunt, and Duke. While Nintendo did its best to have the crew cut commando toned down in the N64 port of the PC game, Duke returns with most of his bravado intact in this original title. Staying true to the series, *Zero Hour* can be played in the first-person perspective, but like the PlayStation's *Duke Nukem: Time to Kill*, here Duke is more than a weapon arm and occasional voice sample—he's a fleshed out, fully playable, third-person character as well.

Perspective options aside, Duke's latest adventure has him thwarting another alien invasion. But this time, with a



Terminator-like plot twist, Duke must travel through different time periods to save his ancestors from alien attacks. The storyline is identical to N-Space's *Duke Nukem: Time to Kill*, with Duke even visiting some of the same time periods, including present-day New York City and the Old West. But GT is quick to point out that the game is not a port—Eurocom is only sharing the same story premise, and all of *Zero Hour*'s levels have been designed specifically for the N64.

The gameplay will feature the projectile combat that one expects from a

FORMAT
Nintendo 64

PUBLISHER
GT Interactive

DEVELOPER
Eurocom

RELEASE DATE
Spring 1999

ORIGIN
U.K.



We thought *Turok 2* had the market cornered on gun-toting lizards



No, the Village People haven't mutated. Collectively assembled here are the enemy pigs dressed for each time period



Eurocom's conceptual sketches reveal several characters that certainly aren't selling Girl Scout cookies



From a third-person perspective, you can watch Duke unload on the enemy host



Duke game, but will also incorporate more mission objectives as well. Subtle changes include several item-specific tasks. For example, instead of simply hitting switches to open doors, players may have to use a crowbar or wire cutters to find the exit. Other tasks include destroying alien machinery, and this time, Duke will have to free more than those captive dancing girls (although they'll be there, too). Aliens have targeted Duke's lineage, so he'll need to save his relatives. And for added bonus points, players have the option of saving historical figures from each respective time period they visit. In a climactic Time Collision level, Duke must explore an area where multiple time zones have blended to form a strange environment, and subsequently, he must destroy the alien mothership and "Evil Duke," an abominable mirror-version of Duke created by the aliens.

Eurocom already has a four-player multiplayer deathmatch mode running, complete with a special "deathmatch only" vortex-grenade that strips its victims of their weapons and warps them to another part of the map. The developer is also planning a four-player cooperative experience. Unlike some 3D games that slip sprites into the background, *Duke's* characters, backgrounds, and even pickups are fully polygonal. And in keeping with 3D Realms' original vision for *Duke Nukem*, the environments will be highly interactive and destructible. Graphic enhancements for the N64 include Mario-like transparent water, dynamic lighting,

texture-mapped 3D skies, and colored fog. A rotational as well as motion capture animation system has enabled Eurocom's artists to make all of *Duke Nukem's* cast move more realistically.

If *Duke Nukem: Zero Hour* arrives on

Zero Hour can be played in first-person, but Duke is a fleshed out, fully playable, third-person character as well

schedule this spring, it may come just when action-adventure-starved N64 gamers need it the most — long after they're done with *Zelda*, and long before Rare's *Perfect Dark* hits the shelves. Until then, gamers looking for machismo better keep practicing that sneer.

NG



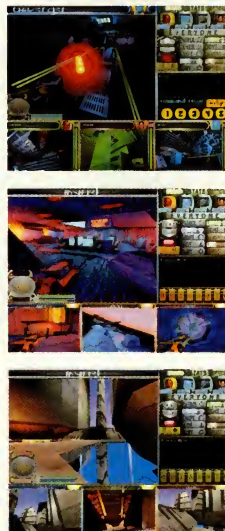
Four-player deathmatch games are already up and running

HIRED GUNS

Psygnosis is about to revive an Amiga classic, courtesy of the *Unreal* engine

In 1993, Psygnosis released *Hired Guns* for the Commodore Amiga. Coming as it did so close to the end of the system's lifecycle, the game achieved critical acclaim for its creator, DMA, but was instantly overshadowed by the emerging *Doom* phenomenon on PC. Despite offering a multiplayer experience to rival anything id Software could provide, this 16-bit classic was largely forgotten. Until, that is, technology came to the rescue.

***Hired Guns* on Amiga** had a distinctive feature that prevented a PC



The four-player split-screen operates in single-player mode and with network team play. Managing your team tactics is crucial

FORMAT
PC

PUBLISHER
Psygnosis

DEVELOPER
Devil's Thumb Ent.

RELEASE DATE
Spring 1999

ORIGIN
U.S.

remake: four-player split-screen squad play. On the Amiga it was only possible using *Dungeon Master*-style scrolling, one frame at a time. To recreate four independent views in realtime 3D was more than the Amiga could cope with, and until recently, more than the PC could handle at anything close to an acceptable framerate. Now Psygnosis has brought DMA founder David Jones

together with start-up coders Devil's Thumb Entertainment to bring *Hired Guns* back from the dead, with help from the powerful and flexible *Unreal* engine. The premise of the game is simple: four mercenaries (each with his own viewing window on screen) romp around a distant planetary system seeking to free Terran colonists from the clutches of numerous evil corporations. The action is



The environments blend sci-fi corporate with living areas. For this reason, the world will make sense as something more than a collection of maps



Recognize the lighting effects? The Unreal engine struts its stuff

all first-person, but unlike *Unreal*, the game that spawned the engine, (or was it the other way around?), *Hired Guns* will require a great deal of tactical thinking — a crucial factor in the success of the Amiga original.

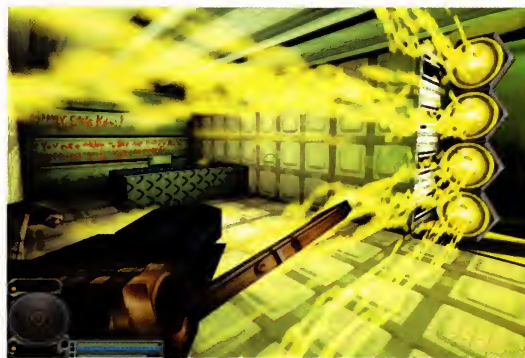
Each character has specific skills that must be judiciously employed in order to progress, and you'll find yourself switching between Kircher, Rorian, Osverger, and Myriel in turn to find the best way through a level. Players of the original will recall their dismay at losing a team member just as they'd figured out how to solve the map puzzles, or finding themselves waiting at the sealed exit from the level while the explosives expert fought his way up from the catacombs to blow the door. Back then, it was four players all huddled around one Amiga and a TV — with one on joystick, the other with the mouse, and the remaining two fighting over which end of the keyboard they wanted. Of course, with modern network play, things are a little easier (*Hired Guns* supports up to eight players via LAN and Internet), but the tension and atmosphere you get from cooperative tactical play remain firmly intact. Think *Rainbow Six* with explosive firepower.

Another key feature of the Amiga title that has been retained for the update is texture variety. Unlike many other first-person shooters, which rely heavily on repeated textures and levels with little artistic variety, *Hired Guns* will, according to Devil's Thumb boss, Tony Harman, do things differently. "The atmosphere was crucial in *Hired Guns*," he explains, "and I think we've succeeded in creating an atmosphere for

this version that's unlike any other 3D shooter to date. We use entirely new texture sets for each level of the game, so that players will keep pushing themselves to see what beautiful world they will encounter next."

The original *Hired Guns* eventually made it to the PC, but died a death at retail thanks to outdated technology. With the *Unreal* engine powering the show this time around, *Hired Guns* stands a much better chance of making its mark on a genre that is in desperate need of evolution.

NG



Part of the attraction of the new *Hired Guns*, according to Devil's Thumb boss Tony Harman, is the variety of textures between levels

"The best online-only game we've ever seen."
Online Gaming Review

"One of the most brilliant action games around."
Gamesdomain

"This game looks to be hotter than Diablo."
E3 Show Daily



TEAM UP &

"don't outrun
me Sulky we
got a date with
the endzone"

Thorn



commando Thorn sees
his chance to be a hero

"shake your
boots commandos
I need cover
fire here"

Sulky



heading upfield ball in hand
Sulky realizes she's target #1



4 games in all

multiple arenas 10 minute matches fast & fierce
many ways to play one way to win: teamwork



Capture the Flag

the name says it: capture and hold as
many flags as you can for as long as you can



BaseTag

score points by destroying enemy
base stations while defending your own

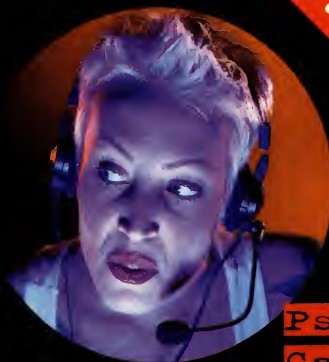


Team Deathmatch

hunt the other team to rack up kills,
then protect weakened teammates
or you'll be overrun

TALK IT UP

Buy FireTeam
direct only @
www.fireteam.com
or 1.888.689.TEAM



"I'll drop an
auto-turret
to cover
our flank"

**Psycho
Cat**

her last kill forced a fumble
now PsychoCat's about to draw fire



"pound it up
the right side
you guys I'm
just about
wasted"

MadMac

fresh from frying one Ferret
MadMac takes heat for the team

Gunball: kill for the ball,
then score or die trying

FireTeam
true team play
up to 12 players per game
online
real-time talk
with your teammates
online
team up
talk it up
or lose

True Team Play
Real-Time Talk
www.fireteam.com

\$59.95

[plus S&H]

Includes NC65
Gameware™ headset
and unlimited free play.
No monthly fee.

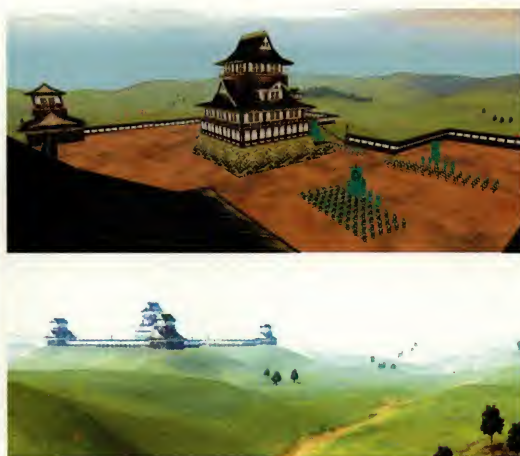


SHOGUN

Forget about tanks and Tesla coils — try conquering feudal Japan in this comprehensive strategy game



Throughout the game, ornate castles will need to be attacked or defended



The turn-based campaign part of the game is played on a map of Japan

When Next Generation first saw *Shogun* (then under the name *Taisho: Total War*), we experienced a rare moment of awe. The monitor displayed a realtime battlefield with rolling green hills upon which armies of Samurai maneuvered, stately banners waving above them. Sure enough, *Shogun* looks to be that rare breed of strategy game: One that features both a fresh design and a powerful engine.

The concept is simple, as a Daimyo (feudal lord) players attempt to become the supreme military dictator of Japan. To keep players immersed in the struggles of feudal Japan, *Shogun* weaves together what have traditionally been two distinct genres of gameplay. A turn-based game

that involves diplomacy and resource management is played out over a 2D map of Japan. This provides the framework for the realtime battles, where players command armies on stunning 3D landscapes.

"It matches reality" says Mike Simpson, Creative Assembly's Director of Development, "campaigning was a seasonal business, planned and executed



122 rules of Engagement from Sun-Tsu's *Art of War* have been coded into the AI

FORMAT
PC

PUBLISHER
Electronic Arts

DEVELOPER
Creative Assembly

RELEASE DATE
Spring 1999

ORIGIN
U.K.

over months, whereas individual battles were over in a day. [The Feudal lord] Tokugawa never complained about the cross-genre nature of warfare."

Of course, as a modern consumer, you can expect options such as "Battle only" and "Campaign only" modes. The Battle mode is basically a sequence of battlefield scenarios, and in the Campaign mode, you play the strategic level, and the



The units are sprite based, simply because displaying 5000 units at a measly 50 polygons per man would require a graphics card 10 times faster than those currently available



For those cave-dwelling PC owners still running in software, this game will run without a 3D accelerator card



battle results are calculated for you. There are various multiplayer options, including a play by email option, where you play the campaign level versus other human players, and battles are either calculated or played versus the computer.

But players won't want to skip the battles. The engine can handle up to 5,000 individual men on the battlefield at once,

and each unit boasts individual AI. According to Creative Assembly, AI is done at three levels. The general decides overall army strategy and gives orders, the unit commander AI works out what his unit is going to do to obey his orders, and the individual warriors work out what they must try to do to obey the unit orders. So individual soldiers will know how to stay in formation. If left behind, their AI will tell



Snow-covered environments have been created for battles fought in winter





To win battles, players will need to learn effective troop formations



"The camera doesn't point down at the ground because it's afraid it might see too many polygons"

Mike Simpson, Creative Assembly's Director of Development

polygons. We have real line of sight, not artificial fog of war. If you want to see what's on the other side of a hill, get a man up there."

As organic as the AI and camera may seem, the units are even more authentic. Simpson puts it bluntly: "They're real. One-thousand-plus years of battlefield evolution went in to making them what they were at the time. They work, and for any tactical situation, there is a unit type to deal with it."

Subsequently, there are calvary units

and foot soldiers armed with swords, spears, and bows. In the course of the game, Portuguese traders will offer guns to players—at the price of converting from Buddhism to Christianity.

"You can choose not to trade with them and stay Buddhist," Simpson explains, "which has its own advantages. Either way everyone can get guns when the Dutch traders turn up later."

The proper representation of unit types is only one example of the how historically accurate the game will be. In the end, Creative Assembly has modeled everything from income, to costumes, to architecture, to geographic provinces and their terrain, to around 300 famous individuals (Daimyo, Generals, Unit commanders) based on historical information. And if, when finished this spring, *Shogun* plays as good as it looks, the game will serve as a lesson to all those who jealously watch Creative Assembly pull in its royalties — it pays to do your homework.

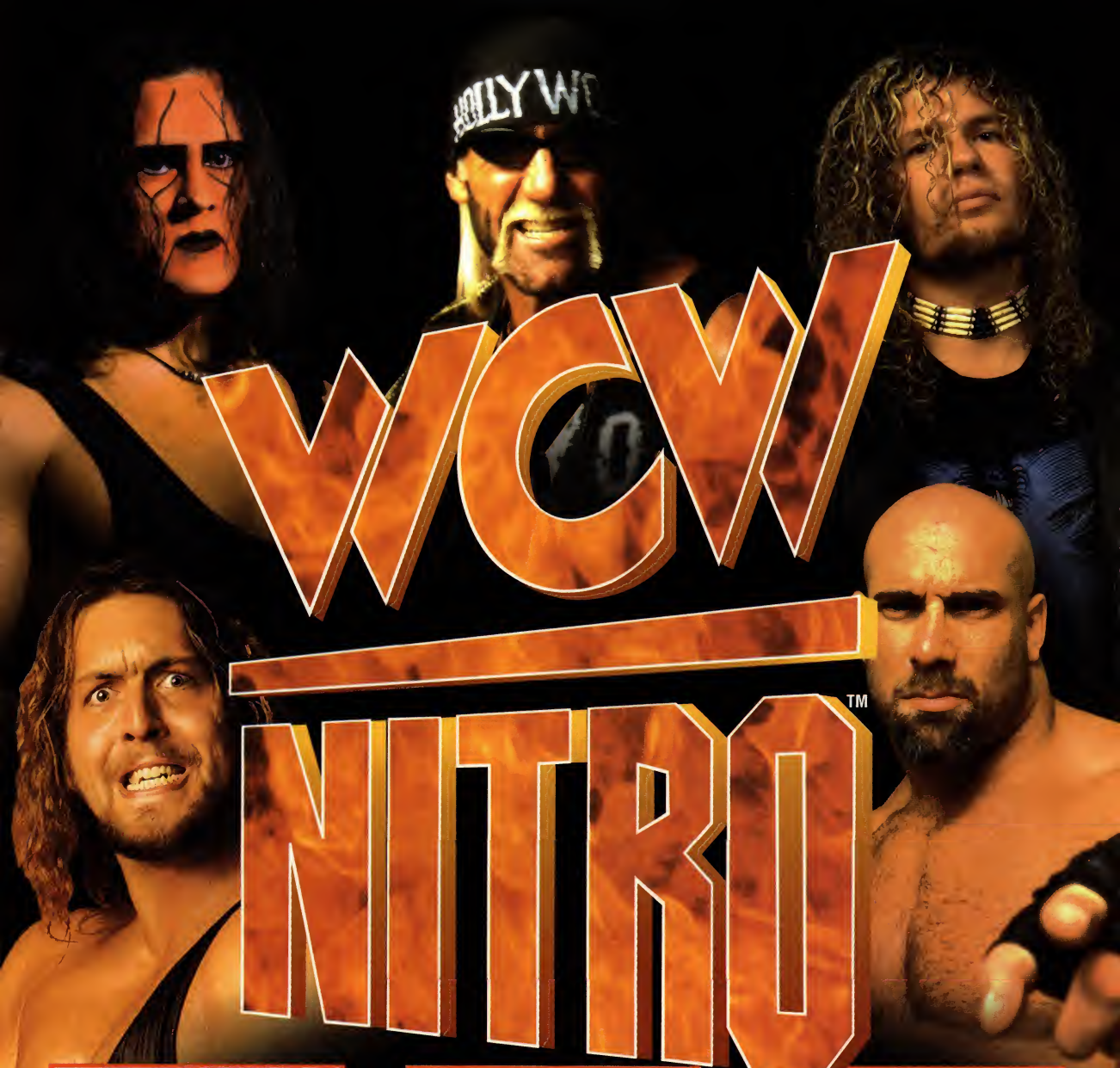
NE



Players can zoom in on an individual unit, or pull out the camera to see all of the battlefield



Each Daimyo has his own unique character based on historical reality. Start with the Daimyo from Iga (birthplace of the Ninja) and you begin with a Ninja Dojo



• The most realistic PC wrestling game ever!

• Over 60 of the top WCW and NWO superstars

• Signature and finishing moves, taunts, and rants



more than you can handle

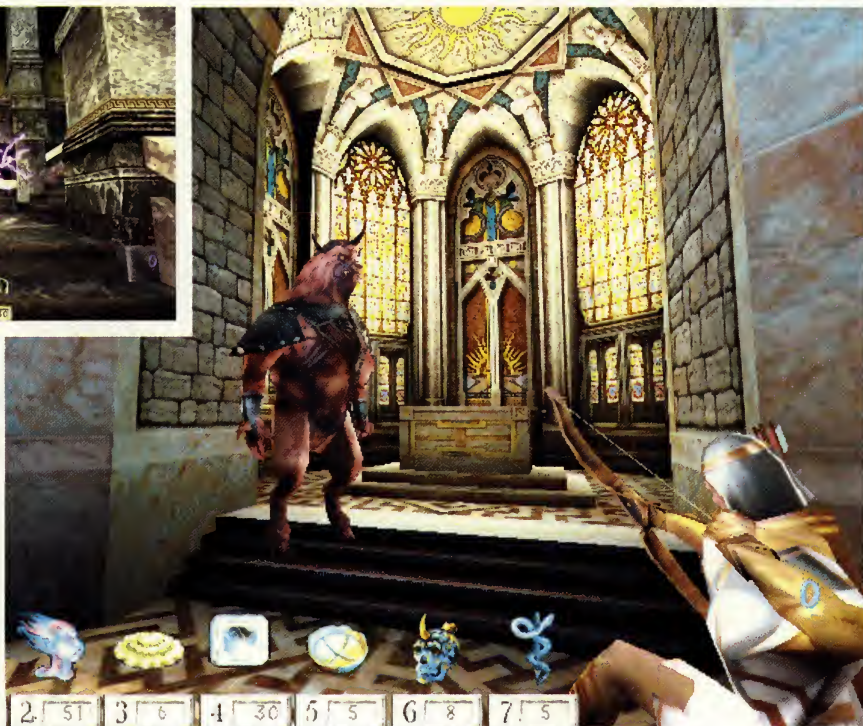


WHEEL OF TIME

Legend harnesses the *Unreal* engine for something more than a point-and-shoot game



This towering castle, currently uninhabited, is certainly worth a look



While defending your fortress (above), a guard raises his bow against a Trolloc

As the relentless pace of PC technology shows few signs of slowing, it's refreshing to find a PC developer keeping its technological ambition firmly in check. That's not to say that *Wheel of Time* from East Coast codeshop Legend is a technical slouch—it isn't. But here, the strategy of using licensed software technology—a tweaked version of the *Unreal* engine—is affording its creators time to concentrate on putting an original spin on the first-person maze genre.

Wheel of Time is based on the second most popular series of fantasy novels in the world. Robert Jordan's staggeringly detailed universe has so far commanded sales of more than six million books, making him every bit a modern-day Tolkien in the eyes of his legions of devoted fans. Perhaps realizing

that the creation of a worthy fantasy RPG based on the series would be a gargantuan task, Legend has opted to create a hybrid of *Quake*-style mayhem



Expect the effects in *Wheel of Time* to be better than *Unreal*'s

FORMAT
PC

PUBLISHER
GT Interactive

DEVELOPER
Legend Entertainment

RELEASE DATE
Q2 1999

ORIGIN
U.S.



The continuity between this sketch and realtime environment is just one example of Legend's awesome preproduction effort to create fabulous architecture



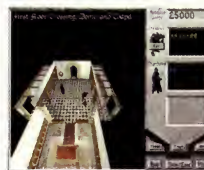
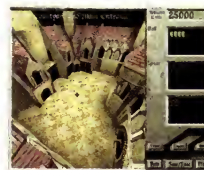
This is one of the most elegant and horrific monsters we've ever seen

and tactical play, all cloaked in rich fantasy themes and aesthetics. "What we're shooting for is to simply make a great game, while remaining as true as possible to the license," says Designer/Producer Glen Dahlgren. "People who don't know anything about the books will still walk in and have a fantastic time."

Primarily designed as a multiplayer experience (although a single-

player game will be included), *Wheel of Time* enables up to four players to choose familiar characters from the variety of absorbing political factions in Jordan's books. Each one commands his or her own fortress and military resources, and each possesses two magical "seals" that must be protected from the advances of fellow players. The game's prime objective is to protect your own seals while infiltrating rival citadels to steal other players' seals. The first to obtain four wins the game.

The initial stages put brain before brawn in a strategic exercise that's far removed from *Quake* or *Unreal*'s immediate shoot-'em-up thrills. Employing an intuitive 3D editor, the first task is to stash your seals in the most inaccessible part of your fortress, then place troops and traps around to further hinder your opponent's attempts to locate them. Players can select different types of troops — from a variety of human soldiers to trolls — and each type possesses a different level of intelligence and effectiveness against invaders. Traps include walls, spears, pits, portcullises, and other devious methods of luring foes to their deaths.



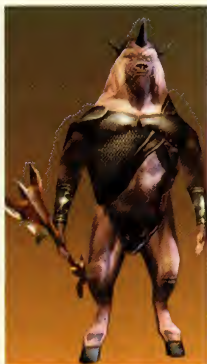
From a *Dungeon Keeper* perspective, players place traps and guards



Sure, these characters are standing around like idiots, but maybe they're just impressed with these fine marble textures



The characters aren't specific to those in the Robert Jordan books, as the game is set in the "Age of Legends," which predates the series



At Legend, if they can draw it, someone can surely render it into a quality 3D model

Once you've configured your own citadel, the action begins as you venture out into the open stretches of undulating terrain that connect each fortress. This is a battlezone where the accruing of magical artifacts is the key to amassing enough power to storm the other citadels. The existence of up to 50 kinds of artifacts gives the game a *Magic the Gathering*- or *Heroes of Might and Magic*-style depth that goes well beyond the simple run-and-shoot gameplay of most *Quake* clones. While artifacts provide players with an arsenal of fantastic weaponry, they can also be used to communicate or to deceive other players, or even to provide healing, transportation, and aid the detection of traps.

While subscribing wholeheartedly to the tried-and-tested, projectile-based shoot-'em-up play found in most first-person *Quake* clones, *Wheel of Time* attempts to strike a balance between visceral head-to-head combat and strategically defensive gameplay. Ultimately it's your decision whether you should be aggressively trying to break down your player's defenses or protecting your own seals back in your citadel — the balance of power in the game constantly shifting between those players with the best artifacts and the soundest strategies.

Visually, there's no doubting the Legend artists' skills on this project. Their excellent textures create some of the most convincing environments yet

seen in a game of this type, and the mood and styling of the different characters is admirably reflected in the subtly different citadel graphics. The technical might of the *Unreal* engine has yet to show signs of being left behind by competing technologies, either. "Given that Epic spent something like six to 10 man-years creating *Unreal*" adds Dahlgren, "we're in a privileged position and have time to focus a lot more on building the game itself. We are targeting a slightly higher spec than *Unreal*, though — simply because we're not shipping until next year."

From the version that *Next Generation* witnessed, *Wheel of Time* has the potential to comfortably straddle a gap between the state of the art in first-person action titles, and engrossing realtime strategy. With an Internet or LAN-based arena mode also offering the immediacy of deathmatch *Quake*, as well as a single-player game providing a mission-based experience that unfolds with a compelling narrative, Legend's title could well entice more than just the fanatical army of Jordan fans.



Models with high polygon counts enable smooth, realistic-looking characters

adventure in 3D-mental!

Mind-bending 8-player multiplayer mode!

150 levels spanning
5 weird worlds.

**Customize your own
insane levels or build
one from scratch!**

Customize your
insane levels or build
one from scratch!

You can run, but you can't hide.
Trying to stay one step ahead of
the game. Sprinting through an
ever-changing 3D maze of
twisted paths. Hunted by
hooded foes at every turn.
Pushing the limits of
gaming stamina. Lode
Runner 2 — easy to
play, impossible to
master. Prepare for
cerebral overload!

800-CALL-267

FROM THE
DEVELOPERS
OF THE BEST-SELLING
PUZZLE GAME,
LODE RUNNER.

FROM THE DEVELOPERS
OF THE BEST-SELLING
PUZZLE GAME,
LODERUNNER.

Lode Runner 2

Available at your local retail store
Direct at store.ginteractive.com or call 1-800-610-6711

MacSoft

EVERYONE

runner

Available at your local retail store
Order direct at store.ginteractive.com or call 1-800-610-GTIS

MacSoft

PC CP

EVERYONE
E
ESRB
RATED
FOR ALL AGES



GT Interactive Software
www.gtinteractive.com

www.gtgames.com

NEED A HINT?

1-900-CALL-2GT

[illegible]

The



Flip book

Get squares, assemble in order and staple.

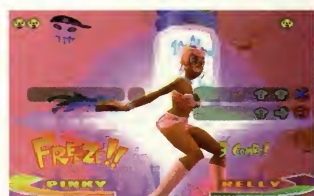
STARRING HEAT



FUNKIN' GROOVIN' DANCE ACTION!

Here's the dilly, yo... It's called Bust A Groove: The fresh, competitive dance game for a funky-up PlayStation® generation. You control more than 10 club characters as they perform their super realistic dance moves to disco, house and hip-hop beats. So get your body movin' with the game that's got the groove goin' on!

www.989studios.com



PlayStation and the PlayStation logos are registered trademarks of Sony Computer Entertainment Inc. 989 Studios and the 989 Studios logo are trademarks of Sony Computer Entertainment America Inc. Published by 989 Studios. © 1998 Metro/Frame Graphics/Avex. D.D. Inc./Enix

STREET FIGHTER ALPHA 3

Ryu and Ken are at it again . . . is the third time a charm?



Flashy super combos remain the trademark of the Alpha series



New characters include Rainbow Mika and Cody from *Final Fight*, and Jui, who's getting familiar with Ryu's hurricane kick

Capcom's public relations department is quick to point out that *Next Generation* "has a bit of bias" against 2D games. The reality is, we're rather quick to point fingers at any series that fails to evolve, visually or otherwise.

However, with a robust build of *Street Fighter Alpha 3* for PlayStation, Capcom has hurdled some of the barriers it has faced with previous incarnations of its 2D arcade games. First and foremost, the frames of character animation seem fairly intact, unlike those found in the pitiful version of *X-Men vs. Street Fighter*. And the load times, astonishingly, are minimal.

With a cast of 28 characters (plus hidden ones), there's sure to be more replayability with this title. Some of *Street Fighter II*'s more colorful characters return, including Blanka, E. Honda, Vega, and Cammy. *Alpha 3* introduces three new characters: Rainbow Mika, Karin, and Jui, and the long-forgotten Cody from *Final Fight* reappears as well.

The gameplay is as much "block-combo-block-counter-super-combo-block-time's up" as it's always been, with enhanced super combos. The "customizable supers" introduced in *Alpha 2* return as well, along with the one all-powerful combo from *Super Street Fighter II*.

Let's face it, Capcom could introduce a new *Street Fighter* game every month



Perhaps the most cohesively detailed and designed series ever, *Street Fighter* continues to blend strong character design with superb animation and precision gameplay.

with one new character and it would be bought by the dedicated fighting game audience that owns every *Street Fighter* game ever made. But here the company has actually made a good case to convince the rest of us that it might be worth spending another \$50 on a game that we've become very, very familiar with.

NG

FORMAT
PlayStation

PUBLISHER
Capcom

DEVELOPER
Capcom

RELEASE DATE
March 1999

ORIGIN
Japan

TOCA 2

After delivering a definitive racer last year, Codemasters returns with an ambitious sequel



Drivers' heads being thrown about during collisions and subsequent arm-waving is now noticeable thanks to transparent windshields



The overall increase in track and car detail is impressive — particularly when compared to last year's effort — resulting in more authenticity

All game sequels should show as much potential as *TOCA 2*. Mirroring the 1998 British Touring Car Championship season may not seem that significant to the U.S. market, but any serious race fan would do well to put aside the latest NASCAR simulation and pay serious attention to Codemasters' latest effort.

The most obvious enhancement to the series is visual. Last year's crude PlayStation graphics now run in the machine's hi-res mode (the PC version will go up to 1,024 x 768). There's realtime light sourcing, and the cars feature a higher number of polygons. Several other effects, such as smoke from blown engines, or tires rubbing on displaced bodywork, are also to be added.

Players race against 15 other drivers, each with his or her own pit strategy and AI personality. Adding to the authenticity is independent suspension and sound for each of the car's four wheels, resulting in highly convincing race vehicles, which drive — and sound — like the real thing. The physics even extend to the weather effects — raindrops roll up or down the windshield, depending on the car's



In addition to the usual championship and time trial modes, a sprint race option is available if you want to compete without having to think about pit stops

speed. Loose hoods are also ripped off at high speeds, and flying bodywork from competing vehicles can damage your car.

Cockpit views feature working dashboards, and you can look either side as well as glance up to the rearview mirror now and again to keep an eye on any position-poaching competitors.

Such scrupulous attention to realism is further reflected in the game's bonus circuits — eight international, freshly tarmac-coated tracks with drastic elevation changes, crossovers, and alternate routes should ensure that you remain hooked.

One of the game's most ambitious features is Codemasters' decision to include the "undercard" Support Car Championship races that occur during British Touring Car weekend meets. You can therefore expect to thrash around in various English racing vehicles, including the F3, Jaguar XJ220, TVR12+, Ford Fiesta, AC Cobra, and the three-wheeled Scorpion. Of course, all the support vehicles feature the same realistic model of the *TOCA* cars.

If Codemasters manages to successfully implement all it has planned for *TOCA 2*, U.S. gamers may find a piece of U.K. culture that's even more appealing than the Spice Girls.



The PlayStation version (above) visually compares to the PC version. With a link-up mode, two-player races feature all 16 cars on the track at once

FORMAT
PC/PlayStation

PUBLISHER
TBA

DEVELOPER
Codemasters

RELEASE DATE
TBA

ORIGIN
U.K.

NG

IT'S WHY YOU STARTED PLAYING RPG'S IN THE FIRST PLACE.



It's time you met your destiny. Tales of Destiny delivers everything the true aficionado of the RPG genre could want and more. Journey the high seas in search of the lost secrets of the ancient Aetherians. Wield weapons so powerful they develop their own intelligence and will. Cast more than 100 amazing spells in real time, making enemies and monsters fear your wrath. Soar through the skies on a fantastic dragon ship, searching for your next adventure. Tales of Destiny. A true RPG crafted with the RPG connoisseur in mind.



namco

SYPHON FILTER

The creator of *Bubsy 3D* is hoping its latest action title will make amends

Comparisons are already being drawn between *Syphon Filter* and Konami's superb *Metal Gear Solid*, but Eidetic's game is an entirely different beast. The emphasis here is less on stealth than action as you infiltrate terrorist hideouts and fight pitched gun battles in the streets.

The plot, which Eidetic claims will be far more central to the game than early preview versions of the title suggest, revolves around the player character, Gabe Logan, averting a biological strike on U.S. soil by shooting as many terrorists as possible.

Acknowledging the difficulty of aiming a gun in third person, Eidetic will include three targeting modes, the default of which auto-targets the nearest hapless terrorist (certain to be a poor shot). This keeps the action flowing — it's possible to run constantly, diving and rolling to avoid enemy bullets while picking off targets with Bond-like accuracy. The emphasis occasionally shifts noticeably from gung-ho to a more strategic approach, which may be where the initial *Metal Gear* comparisons originated. Playing an early build, it's easy to see how *Syphon Filter* could degenerate into a bland shooter, but the team is sensitive to this and is carefully stage-managing the more crucial battles.

What is likely to impress are the

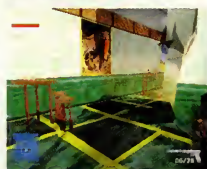


The game pits you, Gabe Logan, against an army of terrorists determined to destroy police property at every available opportunity

environments, which are well designed and gritty enough to provide the required atmosphere without acquiring the all-pervading gray of Konami's title. The motion-capture on the character models has also been well handled, giving the whole thing a cinematic feel (though admittedly more "blockbuster action flick" than "suspense-filled thriller"), and if Eidetic can ensure enough variety between the levels, *Syphon Filter* may be able to shrug off the *Metal Gear* comparisons and claim its own niche in the market. **NG**



The action swings from car-strewn city streets to claustrophobic interiors



When too close to a wall, the view shifts to this transparency



As with *Tomb Raider*, targeting is handled with an optional auto-aim. The guy in the yellow on the left may look like Dustin Hoffman in *Outbreak*, but he's your backup

FORMAT
PlayStation

PUBLISHER
989 Studios

DEVELOPER
Eidetic

RELEASE DATE
Q1 1999

ORIGIN
U.S.

Pioneer

SUGGESTED
↑ 13
UP

The adventure of a lifetime! If anyone can survive it...

Winner of the Best Original Video Animation award at Anime Expo '97 and '98

THE MYSTERIOUS PLAY

F U S H I G I Y Ū G I

ENGLISH VERSION

FUSHIGI YÛGI

THE MYSTERIOUS PLAY

SUBTITLED VERSION

Miaka was an ordinary Tokyo school girl, but when she reads a mysterious book, she is thrust into the Universe of the Four Gods - a magical version of ancient China where martial arts and magic are key components of war. To return home to her family and her beloved fast food restaurants Miaka must summon a god! However, she will also encounter loyal friendship, bloody massacres, absolute betrayal, and true love in an adventure that will teach her the true value of life.

TOWER
RECORDS



SUNCAST
MOTION PICTURE COMPANY
WE KNOW MOVIES

CONSUMERS FOR MORE INFORMATION, SEE OUR WEBSITE
WWW.PIONEERANIMATION.COM, OR CALL 800-421-1621.

© 1998 by Watase/Shogakukan, Inc. • TV Tokyo • Studio Pierrot
All Rights Reserved By Fuji Creative

DEMONSTRATION #2:

- 1 Tear out your old sound card.
- 2 Smash into pieces.
- 3 Toss over your shoulder.

► The sound those pieces make when they hit the ground *all around* you is the power of A3D from Aureal, the only audio that works the way your ears do.

That's why leading sound card vendors, such as Diamond, TerraTec, Turtle Beach, and Xitel, are using Vortex audio technology from Aureal, the only 3D audio accelerator that supports industry leading A3D positional audio technology.

You can also find A3D positional audio on computer models from the industry's leading PC manufacturers.

Audio based on Aureal technology is awesome. But don't take our word for it. Believe Your Ears. Check out A3D at your local retailer.



BELIEVE YOUR EARS™

Visit us at www.A3D.com

SHOGUN ASSASSIN

Is Konami's next adventure *Bushido Blade 2* with a storyline, or *Resident Evil* with swordplay? The answer may be a little of both



Kotaru, as seen in an in-game cut-scene (center circle), and severing an opponent in realtime (left)

Players will often be faced with more than one opponent

As videogame sprites evolved from boxy spacecraft to animating human figures, game developers immediately began the daunting task of capturing the elegant and mystical arts of Japan's Ninja and Samurai. From *Shinobi* to *Tenchu* and *Samurai Shodown* to *Bushido Blade 2*, one would be harder pressed to find a better home for a sophisticated collision detection routine than in a martial arts-based action game.

As *Tenchu* and *Bushido Blade* demonstrate, successful action adventure games are taking on more story-driven elements, and *Shogun Assassin* is no exception. It combines sword-slashing, arterial blood-spraying gameplay with an evolving storyline not unlike the *Resident Evil* series. Players assume the role of either a male warrior, Kotaru, or Hyaku, a female member of the Shogunate police. Like *Resident Evil*, the two characters share an intersecting story. Kotaru returns from training to find trouble brewing in his hometown, and

his parents' graves have mysteriously been dug up. Hyaku has also arrived in town to investigate the disappearance of her brother, who was also working for the Shogunate police.

In Konami's early demo, players could explore the town as either character, and in several cases, players had to successfully defeat several enemies in sword combat in order to progress to the next area. While exploring the town, players have the opportunity to speak to many non-player characters, who occasionally offer players inventory items, such as healing plants.

At this stage, the game's prerendered backgrounds and crisp 3D models already capture the cool anime design that made the *Samurai Shodown* characters so likable. If the combat (still very early) keeps pace with the atmospheric setting and characters, *Shogun Assassin* could position itself as Konami's next big PlayStation winner.

NG



Special moves (center) enable players to damage more than one enemy

FORMAT
PlayStation

PUBLISHER
Konami

DEVELOPER
Konami

RELEASE DATE
Q2 1999

ORIGIN
Japan

YOU can't run from

"Shadow Madness' story is easily comparable, if not superior, to the top titles of the genre..." — *GameFan Online*



your own shadow,
but now you damn well better try.

[www.shadowmadness.com]

On Arkose, things aren't as they seem. A bizarre plague has swept the land, bringing vile creatures out of the shadows, and leaving piles of dust where your friends and relatives once stood. And you've got to put a stop to it before it puts a stop to you. It's an epic RPG with complex battle scenarios. Customizable weaponry. And three styles of magic. Because you're gonna need all the help you can get. Shadow Madness strikes in February 1999.



MAKE YOUR OWN DAMN ROAD!



POWER SLIDE™

SCREAMING-FAST DRIVE ANYWHERE 3D RACING.



Best graphics ever seen in a racing game. Period. Go from 0 to 60 FPS at the speed of thought!



Drive anywhere! Do anything! 6 degrees of limitless freedom! 8 merciless environments! 8 player multiplayer!



Feel the road in your teeth with advanced physics modeling. Mud! Sand! Ice! Snow! And more!

Available at your local retail store.
Order direct at www.gtstore.com or call 1-800-610-GTIS



PowerSlide (c) 1998 GT Interactive Software Corp. All Rights Reserved. Created by Ratbag. Published and Distributed by GT Interactive Software Corp. View GT Titles on a registered linkback of GT Interactive Software Corp. No other trademarks are being used in this advertisement.

MILESTONES

Next Generation's monthly update on tomorrow's games

We are still a year away from the 21st century, but some games are already setting "year 2000" standards. Accolade's resolution to make fewer, better games has brought them to *Slave*

Zero, now poised to hit big (and hopefully, hit Dreamcast.) *Metal Fatigue*, *Outcast*, and other hopeful hits will also arrive in stores in what should be a banner year. Start the party — it's 1999.

SLAVE ZERO PC



Accolade's "3D hardware required" adventure continues to impress Next Generation. These new sewer levels show off the fantastic character designs that many "giant robot" games have failed to capture. And, (center circle) you can squish the pathetic troops in your path



STREET BOARDERS PlayStation



From Japanese developer Micro Cabin, this top-notch skateboarding game will surely come to the U.S.

METAL FATIGUE



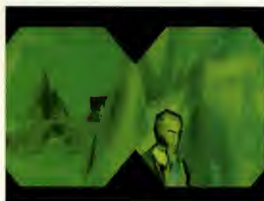
After *Drakan*, Psygnosis may have found another PC winner with this 3D strategy game centered around slick mechs

RUSH DOWN



Not just a snowboarding title, this "Extreme" PlayStation game also features kayaking and mountain biking races

OUTCAST PC



Supported by strong graphic technology, *Outcast* continues to pioneer its own crisp visual style with oddly surreal landscapes and nontraditional characters. New water effects ripple and reflect in realtime (upper left), and realtime bump-mapped dinosaurs now stalk players. This one should hit shelves before summer '99

HYBRID HEAVEN N64



Konami's sci-fi adventure features realtime exploration and a turn-based fighting system that may not appeal to the action gaming crowd

DARKSTONE PC



Developed by Delphine, this fantasy RPG with 3D characters features a scalable top-down perspective. Take 2 Interactive will publish the game

play games?



buy them at



GAMEDEALER.COM

THE INTERNET'S GAME SUPERSTORE

i play games

T-Shirt with every
order over \$50.**

1-800-610-2614

VIP CODE: NXG2

WWW.GAMEDEALER.COM

GREAT PRICES ON THESE TITLES & MORE



CLOCK TOWER II



MADDEN NFL '99



SIN



SPACE STATION SILICON VALLEY

PLAYSTATION

NINTENDO

SEGA

WINDOWS

MACINTOSH

Fax 1-212-387-8021 International 1-212-358-9100 251 Park Ave South New York, NY 10010

*\$4.00 rate US Priority Mail, US orders only. Additional shipping methods are available.

** All orders placed before January 30, 1999.

© 1998 ActionWorld, Inc. All rights reserved. The GameDealer.com logo, The Internet's Game Superstore and I Play Games are trademarks or registered trademarks of ActionWorld, Inc. in the US and other countries. All other trademarks belong to their respective owners.

Lots of Information
Prompt Delivery
\$4.00 Shipping*





“★★★★★”
-Next Generation




Stunning 3D graphics - unbelievably beautiful environments



Dozens of detailed campaign options: varied missions and realistic play



Peripherals supported: DirectX supported joysticks, 3D cards and Force Feedback



LEAD, DESTROY, OR GET THE HELL OUT OF THE WAY.

UPRISING² LEAD AND DESTROY

SEQUEL TO "THE ACTION GAME OF THE YEAR."*



- INTENSE MULTIPLAYER ACTION • SUPPORTS TEAM PLAY & INTERNET NETWORK SCENARIOS
- ONE OF THE MOST POWERFUL WEAPONS PLATFORMS EVER CONCEIVED FOR A PC GAME
- COMMAND AN ARMY (TROOPS, HIGH-TECH TANKS, GUNSHIPS AND BOMBERS) FROM THE FRONT LINES WHILE FIGHTING RIGHT BESIDE THEM IN THE TRENCHES
- STREAMLINED INTERFACE AND DESIGN MEANS LESS TIME LEARNING AND MORE TIME PLAYING



3DOTM
www.3do.com

© 1998 The 3DO Company. All Rights Reserved. Cyclone Studios, Uprising, Lead and Destroy, 3DO, and their respective logos, are trademarks or registered trademarks of The 3DO Company in the U.S. and/or other countries. All other trademarks belong to their respective owners. Cyclone Studios is a division of The 3DO Company. *Computer Games Strategy Plus 1997.

© 1998 3DO Interactive, Inc. The 3DO Interactive logo is a trademark or registered trademark of 3DO Interactive, Inc. in the USA and in other select countries.



Realtime lighting, environment mapping, the extravagant use of polygons — today's videogames can handle them all. Or can they? **Next Generation** investigates the shadowy world of digital duplicity. A special report

Whoever said cheaters never prosper obviously never designed a videogame. Cheaters are everywhere in this industry. Cheaters write the games, and then cheaters go on to market them. This sounds like a damning indictment, but really it's not. Cheating is a necessary evil. In fact, it is often the only way to meet the demands of the audience while remaining within the limits of the technology. The games most admired today — *Quake*, *Incoming*, *Tomb Raider II* — all cut corners, compromise, and economize with the truth here and there. And, if they didn't, they would be far duller and far less playable.

Cheating to get by

Of course, cheating has been around for quite some time. The Commodore 64 and Apple II used large sections of the screen to display scores, lives, and other game data in order to make the actual game window smaller. This practice hid the fact that each system's processor could barely handle fast-scrolling maps and 3D flight-sim graphics full-screen at a respectable framerate. The logic is simple: The smaller the window, the less work the processor had to do to draw the game's graphics. A clever trick.

There are many more examples of hardware deficiencies overcome by clever programming. The Atari ST, unlike the Amiga, had no hardware scrolling abilities. The machine's screen memory mapped in bitplanes, with four bitplanes across the screen — a great system for moving large chunks of graphics, but terrible for shifting pixels. This meant that most early games on the system featured no horizontal scrolling at all (see *Speedball*, for example — the pitch is only a screen wide). Programmers got around this shortcoming by "preshifting" pixels — instead of scrolling a single object across the screen, they stored 16 versions of the object and cycled through them. Not strictly aboveboard, but it got the job done.

In addition, most of the pre-16-bit consoles limited the amount of sprites the screen could display along a single line at any given time. To overcome this nasty limitation, game makers implemented clever sprite-sorting routines that would display different sprites on different frames of action. This covert technique led to a lot of sprite flicker, but that was a whole lot better than having the lead character and three of the baddies disappear altogether for a couple of seconds.

Technology has always lagged behind the ambitions of developers, which means cheating is more or less built into the history of game programming.

Cheating to improve

These days, PC and console hardware easily copes with the basics of 3D visuals. Tricks are still required, however, to keep framerates up, and occasionally these tricks are abundantly obvious. Fogging may have been presented as a feature when it first appeared in games like *Magic Carpet* and *Myst*, but now players are all too aware that it's used to limit the amount of scenery the game has to draw. Similarly, flight-sim developers once made a big deal out of the intricacy and realism of their onscreen cockpit layouts, somehow forgetting to mention that the larger these displays were, the smaller the actual action section, and therefore the lower the demands placed on the 3D engine.

As gamers become more sophisticated, though, these heavy-handed approaches are losing favor. The trick now is to come up with techniques that shave milliseconds off the processing speed without causing the player to notice that the game world has been compromised. In *Tomb Raider II*, for example, the programmers avoided coming up with processor-intensive route-finding code for the enemies by



Most screens in classic games (top) include a huge slab of score data, which reduces the game area, thereby giving the processor more time to think. *Metroid* (above) on the NES is less forgiving

cheat?



Baddies in *Tomb Raider II* (above) can walk through solid matter, simplifying path-finding. Naughty Dog gets the processor power to create its lavish *Crash Bandicoot* (right) by cleverly, and severely, restricting the view distance



Another line-up of the usual suspects: the cheating *Tomb Raider*, the lying *Forsaken* and the never truthful *Quake*

allowing them to walk through many of the scenic objects Lara can't. It sounds as if it should be pretty noticeable, but in the heat of the action, the player rarely spots that anything is amiss.

It seems every developer has its own way to beat the framerate/decent visuals trade-off. Nick Bruty of Planet Moon recalls a few tricks that he used while working on *MDK* for Shiny Entertainment. "While

draw was the ground. So if you were in one of the massive arenas we would simply shift the camera angle down so you saw less of the floor, and put in more air attacks."

James Russell and Mike Kavallierou, developer support engineers at SCE, spot much of the speed-saving subterfuge committed by PlayStation developers. "*Metal Gear Solid* has more than one 3D

Technology has always lagged behind the ambitions of developers, which means **cheating is more or less built into the history of game programming**

working on the bombing run (top-down view), we noticed the game would run visibly faster depending on which direction you were facing," he says. "It turns out that the orientation with which you store your textures in memory made it easier for the cache to work. So we just roughly worked out which direction you were most likely to be facing and adjusted the textures to match.

"When you're working out which polygons to draw onscreen, the first thing you do is throw away all the back-facing polys. Then on particularly long arenas we would deliberately ripple the floor geometry so half the floor was always facing away from you and we wouldn't have to draw it. The slowest thing for us to

model for its main character, depending on the view," they begin. "From some angles, it's easier to have a low polygon count with crappier textures because the player won't notice. Similarly, some football games have many different models of the players — the closer they are, the more detailed the player. This means they can draw lots of players far away and the processor can still cope. It's even the same with *Gran Turismo* — the car models are of a higher quality on the selection screens where the game has nothing else to draw."

Russell adds, "*Spyro the Dragon* does the same sort of thing but with backgrounds. There are actually two different background renderers in the game —

THE FIRSTPERSON SHOOT-EM-UP: BORN TO CHEAT

It is no coincidence that so many advances in the field of ostentatious special effects have come from the first-person shoot-'em-up. The genre is a veritable cheat's paradise.

Doom started it. Heralded as a revolution in 3D gaming, the title didn't have a true 3D bone in its body—it was all just clever 2D programming. Take a look at any of the game's level maps again—the engine never has to make any height calculations, because none of the corridors ever go above or below each other; it doesn't matter where you stand, the computer can always work out at what height you really are. The camera angle is also fixed so, again, the engine has



The AI in *Doom* (top) wakes monsters to the incoming player, who they head straight toward. For *Unreal* (above), the beasts have at least learned to dive about their environments

much less work to do. OK, the player can't look up or down, but this doesn't matter. Because there are no real height calculations, it's possible to shoot at baddies even if they appear higher or lower. To keep the speed up, there are also no slopes or arches—each level is made up entirely of vertical blocks. *Doom* is a classic example, proving that not only do cheats prosper, but they also become legends.

Today's first-person shoot-'em-ups may well be true 3D and filled with complex architecture, but the genre still saves developers many potential headaches. For a start, titles like *Quake* and *Forsaken* tend to be corridor or chamber based, which restricts the amount of landscape that needs to be drawn and keeps the framerate up. Also, the first-person view means it's not necessary to draw a main character. There's no model building, no animation, and no texture space wasted. More importantly, though, programmers don't have to worry about creating external camera angles, which is one of the most troublesome areas of third-person game development (just look at the mess *Psychosis* made of *Rascal*).

near and far. This enables a much larger poly count because the 'far' background consists of nontextured polys which are slightly faster to draw. The renderers perfectly change between textured (near) and nontextured (far) without the player noticing."

There are many similar techniques. Pointing the camera downward (*Croc*, *Rascal*) releases 3D platform games from having to draw way off into the distance, which would slow them down. In a related vein,

current industry buzzword, and unless it is applied before terms like "lighting" and "environment mapping," then the game is not worth the CD it's burned on in the marketing department's eyes.

Developers are acutely aware of gamers' expectations, but they're also aware that true realtime effects are a near impossibility if decent framerates are to be maintained. The answer is to provide a close approximation of the goods.

"Realtime" is the current industry buzzword, and unless it is applied before terms like "lighting" and "environment mapping," **then the game is not worth the CD it's burned on** in the marketing department's eyes

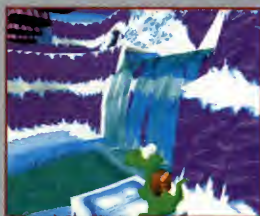
designing each level or track with plenty of narrow valleys and twisty-turny paths ensures that the player never sees more than a few hundred yards ahead. That means the game only has to draw close surroundings, reducing the number of polys that have to be drawn and so preventing ugly scenic pop-up on the horizon (Naughty Dog employs this little ruse throughout its visually opulent *Crash Bandicoot* series). The framerate scam, it seems, is as valuable a part of the game designer's repertoire as any 3D art package.

Cheating to impress

In today's hugely competitive software market, it is not enough to boast about a fast 3D engine; gamers are hungry for special effects. The rise of the 3D card, together with the cult of the console custom chip, has led players to expect realtime imagery approaching the quality of SGI-rendered intros. "Realtime" is the

Lighting is one area where approximation happens quite a lot. As Kavallierou says, "Realtime lighting is computationally expensive. You have to trace rays from the light sources and calculate how much light is falling onto a particular surface, which will affect its brightness. This will also be affected by objects getting in the way, and if one of these objects has a reflective surface, you have to perform even more calculations." None of this process is practical in a fast-moving game.

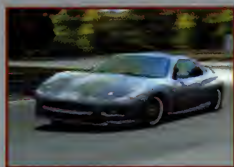
The alternative? "Well, it turns out that if you calculate the proper colors at each corner of the polygon (three or four calculations), then interpolate between these colors to calculate the color of each pixel in between [a process more familiarly known as Gourard shading], the results approximate what you'd get using proper ray tracing," says Kavallierou. "The 'advanced' lighting in *Forsaken* is just the



Multiple models keep *Metal Gear Solid* (top right) and *Spyro the Dragon* (lower left) running smoothly. *Croc* (middle, right) points the camera down instead. *Magic Carpet* (top left) simply opts for fogging



Even with a 3D accelerator, games like *Rage's Incoming* require clever programming to look this good



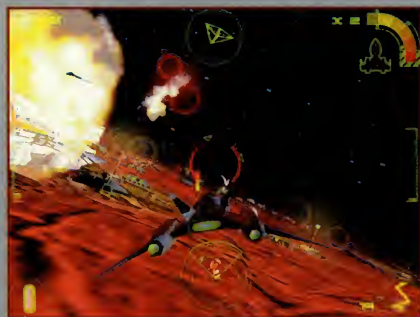
Gran Turismo's fine FMV sequences give way to some trickery-intense in-game visuals (above)

programmers tinting the corners of each poly appropriately and letting the interpolation take care of the rest. It's actually very simple to do, but the effect looks great." One more marketing myth bites the dust.

Another favorite effect that isn't quite what it's cracked up to be is environment mapping. According to the rules, it involves accurately mapping a tinted copy of the environment onto the side of a reflective object, such as a brass jug or car chassis. As the object moves, or the player moves around it, the

reflection (or environment map) alters accordingly. Again, despite what certain marketing types may have gamers believe, this effect is far too complex for a game to perform.

Programmers do use reflections, of course, but they don't make them entirely accurate. Kavallierou says, "For reflections, it's usually the overall effect that's impressive rather than the detail. If you examine the mapping on *G7*, for example, it's all cack, but since the focus isn't on that in the game, and it's



all moving so fast, nobody notices. To the untrained eye, it looks great." In most racing games, the vehicles usually pass the same kind of scenery all the time, so the programmer simply has to grab a small chunk of this scenery and map it onto the car in a rotating sphere shape. In this way, the "reflection" looks as though it is accurately portraying the roadside as the car moves.

There are many examples of this kind of optical illusion. Russell and Kavallierou cite one in *Tomb Raider*: "Throughout the game, there are many blue Save crystals, which look like they're reflecting the area Lara is in. But if you look closely, you'll see that the 'reflection' is just the same screen as you, the player, are viewing, but distorted and made blue. The camera faces Lara's back, so you should see her front in the reflection; instead you see her back, because they're just using the last screen image. To create a 'true' reflection would be a big deal — you'd basically have to render the same scene twice for every frame, and *Tomb Raider's* engine is nowhere near fast enough to do that."

Water effects are just as visually impressive, but this is another area in which cheating is common. Jeff Stafford, "visual effects guru" at 8th Wonder, explains,

"All videogame programming is about pulling the wool over people's eyes to a certain extent. You're not really an intergalactic superhero, and those aren't really devious alien fiends — they're some triangles and a motion algorithm"

Mark Atkinson, technical director, Computer Artworks

"Water caustics [shadowy underwater lighting effects] are a classic example of what appears to be a very complex programming technique involving realtime calculation of light rays, refracting through a water surface. In reality, all that is needed to fool the eye is simple random colors pulsing up and down along a sine wave. Sine waves can also be used to move the vertices of models underwater to produce a convincing effect of water distortion."

So, tricks are everywhere — you can't trust any of



Particle System's *I-War* created high-quality textures for its in-game craft by rendering out still images of the prerendered spaceships

the breathtaking visual effects you see onscreen. The fabulous "fade to battle" effect in *Final Fantasy VII*? All the game makers are doing is adding the latest screen frame on top of the old one and rotating it a bit. The rippling puddles in *Metal Gear Solid*? They're simply graphics of a slowly expanding circle, which looks like a real ripple from a distance.

Getting away with it

So does all this conniving undermine the perceived brilliance of the game coder? Of course not. As Oliver Norton at 8th Wonder argues, "Coming up with ways to achieve stunning visual effects on the cheap is a skill in itself. The art of generating innovative, computationally inexpensive methods for visual effects is a core skill in game development for both artists and programmers." Mark Atkinson, technical director at Computer Artworks, puts it another way: "The first thing to point out is that all videogame programming is about pulling the wool over people's eyes to a certain extent. You're not really an intergalactic superhero, and those aren't really devious alien fiends — they're some triangles and a motion algorithm. The trick is always creating as convincing an environment as possible within the limitations of the hardware and the development time available." Indeed, game programming is often a form of creative accountancy: The skill is to make it look as though the business (the hardware) is doing really well, when the true power is exerted by the little man behind the scenes with the calculator and a sleeve full of clever tricks.

AI: EXPLODING THE MYTH

Artificial Intelligence involves the construction of computer-controlled entities capable of imitating real thought processes like deduction, hypothesis, and conjecture. An artificially intelligent character learns from its environment and from its own actions, and is not directly controlled by lines of code. So, is this what happens in games that boast "advanced AI"? The simple answer is no.

Most AI in games is actually rule based — the opponents simply follow a series of rules triggered by events in the game. Toby Simpson, creative director at Cyberlife, explains:

"In a *Command & Conquer*-type game, the computer player's base-building system might have rules like this:

```

  IF NOT being attacked,
  IF 'Yes', go into attack mode
  THEN, continue
  ELSE, have lots of money?
  YES, go to building defensive at the moment,
  Defensive - go to 'building' phase
  Attack - go to attack phase
  IF planning enough AI, and I have enough power, build a power station
  ELSE, I don't have enough power, build a power station
  
```

Basically, this is just a huge tree of 'if this condition, do this' type commands."

So, then, the most advanced AI gamers is in games where the programmers have added the most rules. In *Doom*, the baddies simply stood around until they "saw" the player; they would then run at him shooting until they were killed. In a modern first-person shooter like *Unreal*, the baddies are given information about their surroundings, about their own health, and about the player, so they can appear intelligent. Now, when they see the player, they will still attack, but may run behind a box for cover, or run away altogether if their health falls too low. This is not intelligence — the models are just responding to triggers; even when they get behind a box there is usually a preset route for them to follow.

It is possible, though, to fake the more in-depth fundamentals of AI. As Oliver Norton at 8th Wonder points out, "You can build a very simple simulation of the learning process with a surprisingly small amount of basic software. One very useful approach to beating a human player is to look for patterns in behavior. The AI thinks 'Ah, the player often follows a high kick with a low punch, so I should perform a low block after each high kick.' Assessing the most successful strategies is also good. If the player blocks the computer's attack 90% of the time, then it's probably time to try a different approach." Again, the computer isn't really learning, but it is adapting its techniques based on external stimuli, which is at least a step in the right direction.

However, the problem is that basing AI on sets of rules and preset paths can never be entirely effective, as the programmer can never think of every possible outcome. *C&C* is heralded as a classic, but Mark Atkinson has found its AI to be littered with weak points: "For instance, you could build a series of ore containers right into the enemy base, then build some missile towers on the end to hilarious effect. Or you could jam the computer's landing craft between two frigates in a 'V' and no more would appear for the rest of the game. Then there's the way the computer would send two attack helicopters against your Tesla coil, so you'd build four AA guns, and it would send two more helicopters which would be blown away this time. Then it would send two again in another five minutes, going for the same target in the same way every time, and every time being destroyed."

The thing is, developers tend to get away with substandard AI, because players can't see it in the same way as they can see lighting effects and animation. Furthermore, players believe what they want to believe. If a baddie suddenly stops running toward you and dives behind a bush, you don't know whether this was part of a complex AI procedure, or the result of a simple one-line command to dive behind a bush. If you're enjoying the game, you may just go for the former. Unfortunately real AI (if that isn't a contradiction in terms) is so monumentally complex, it would be impossible to implement anyway.

Even if real in-game AI were possible, there are even questions as to whether it would be a good thing. As Chris Hecker at codeshop Definition 6 opines, "The big secret of game development is that players think they want smarter AI, but they really don't. In fact, the industry is rife with anecdotes of smart AIs being torn out during playtesting because they weren't as much fun as dumb AIs (they were too unpredictable, or too hard, or whatever). What players really want, although they don't know to ask for it, is fun AIs. That's not the same thing as smart AIs." Perhaps he is right. After all, if Gary Kasparov can be beaten by an incredibly intelligent computer program, what chance do gamers have?

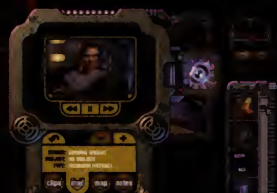
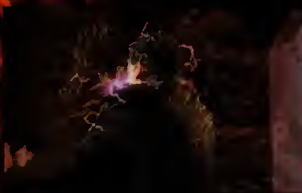


Artificial Intelligence is the biggest misnomer in marketing. *C&C* (top) and *Starcraft* (center) pride themselves on fooling you. *Creatures 2* (bottom) is a bit more honest



ON THE DARK
SIDE OF THE MOON™
GREED IS THE ONLY
DEADLY SIN.

SOME PEOPLE WILL DO ANYTHING TO FIND
THE RICHES BURIED DEEP INSIDE
THE ALIEN MINING COLONY.
OTHERS WILL DO WHATEVER IT
TAKES TO KEEP THEM HIDDEN.



Dark Side Of The Moon is a deep-space
sci-fi adventure that will immerse you in
360° of completely seamless, incredibly
realistic, motion picture-quality gaming.

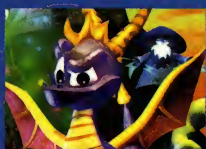


WHAT DID SUPER MARIO 64 EVER DO FOR VIDEOGAMES?

Two years later *Mario 64*
remains unrivaled as a
3D platform game.



CONTENDER #1

**Spyro the Dragon**

Format: PlayStation
Publisher: SCEA
Developer: Insomniac Games

Who would be king?

Spyro, a cute purple dragon

It's this close...

Players negotiate a 3D world collecting stars

But...

The emphasis is on interaction with characters, humor, and on boosting the twitch factor, with cinematic sequences for good measure. And hey, *Spyro* is on PlayStation

CONTENDER #2

**Glover**

Format: Nintendo 64
Publisher: Hasbro
Developer: Interactive Studios

Who would be king?

A glove and a ball, as two equal partners

It's this close...

Players negotiate a cartoon-style *Mario*-esque environment

But...

It's more like *Marble Madness* meets *Head over Heels*. The glove looks a little like the cheeky plumber, but when playing as the ball *Glover* seems more like a puzzle game

Has he squashed the opposition?

CONTENDER #3

**Tonic Trouble**

Format: PC/Nintendo 64
Publisher: Ubisoft
Developer: In-house

Who would be king?

Ed, an extraterrestrial

It's this close...

Players negotiate a *Mario*-esque environment, enjoying racing sections and a snow world

But...

"In *Mario 64* the characters other than *Mario* are one-dimensional. In *Tonic Trouble* all of the characters react differently," says project manager Gregoire Gobbi

CONTENDER #4

**Crash Bandicoot 3**

Format: PlayStation
Publisher: SCEA
Developer: Naughty Dog

Who would be king?

A bandicoot called Crash

It's this close...

For the first time, *Crash Bandicoot* has true free-roaming 3D sections

But...

They will be clearly separated from *Crash's* traditional two-and-a-half dimensional sprint. Plus, *Crash* will use vehicles such as a biplane, and the camera will be in chase mode, as in *Diddy Kong Racing*

It's probably an exaggeration to say that *Mario 64* is a *Space Invaders* for the '90s. Other titles, such as id Software's *Doom* and Westwood Studios' *Dune 2* have surely changed videogaming as significantly and spawned as many imitators as Miyamoto's classic.

And yet it's easy to find competent updates of *Doom* (*Quake*, *Unreal*) and *Dune 2* (*Red Alert*, *Total Annihilation*). Throughout the history of videogaming, titles that have opened up new avenues in gaming have been bettered by their descendants. Even titles that have not been obviously improved upon, such as Braben's *Elite*, are at least superseded by technologically superior models (Gremlin's *Hardwar*, for instance).

This isn't happening with *Super Mario 64*.

Croc was perhaps the earliest *Mario*-like, although the comparison isn't wholly appropriate since Argonaut was creating *Croc* well before Miyamoto's character squeaked his first "It's me, Mario!" Yet *Croc* set the standard of subsequent 3D platform games — such as *Rascal* and *Gex 64*. And that standard wasn't especially high.

Many, including *Next Generation*, had pinned their hopes on Rare's *Banjo-Kazooie* to break the pattern. Certainly, *Banjo* is a splendid game, offering much adventure and technically superior graphics. But sadly, in our opinion, the overenthusiastic welcome that *Banjo* received represents not waving, but drowning. It's not just that everyone is desperate for great games on the N64. It's that everyone's desperate for more *Mario 64*.

Next Generation has occasionally been criticized for its perceived hostility to Rare's *Banjo-Kazooie*. It's not cruelty to animals that lies behind the tempered enthusiasm, though. Rather, it's simply a case of understanding that despite some brilliantly realized elements, such as the animal morphing and the use of sound, *Banjo* isn't "better than *Mario*," despite the rabid claims.

Do you remember your first time? When you first pushed past the plumber's grinning 3D head into *Mario 64's* gameworld? In retrospect, every previous *Mario* game looked like a postcard from this place — it was as if *Mario* had reached out and led you by the hand into totally new territory.

Sure, a game can only be first once. But it's becoming clear that *Mario 64* was special in a way that, say, *Mario World* wasn't. NCL's *Super Metroid* and *Yoshi's Island* were within shooting distance of *Mario's* previous best, while a host of other titles could at least plant one on the plumber's 16-bit chin. But the new dimensions that *Mario* appeared to have opened up now seem, to a pessimist with hindsight, to have closed doors.

According to those pessimists, like a Rubik's Cube compared to an anagram, designing a 3D platform game is a whole level harder than making one in 2D. Just like 3D graphics engines have ushered in a wave of pink slips for graphic designers and programmers who plied their trade with sprites and raster ops, so 3D game design requires new ways of looking at platform games — if not altogether new talent.

Everything changes when a platform goes 3D. In a free-roaming game, where you're free to wander in four directions, just negotiating a ledge becomes a challenge. Designing challenging games becomes a nightmare.

Alternatively, could these be mere teething troubles? Will next year's 3D platform games make *Super Mario 64* look like what it surely is — a beachhead title that claims new land which its imitators must conquer for success?

Next Generation attempts to answer these questions, with the help of 3D game designers currently working on a slew of *Mario*-busters. If Shigeru Miyamoto threw out the rulebook when making *Mario 64*, these are the people trying to piece a new one together.

The 10 Tentative Commandments of 3D Platform Game Design

NEXT GENERATION attempts to divine the new rules of platform gaming

1. Thou shalt not have any other gods before *Mario*

Look at what *Super Mario 64* did, and learn

Super Mario 64 is the benchmark 3D platform game. More importantly, though, the game is a source of continual wonder. Perhaps the greatest lesson that *Mario* holds for developers isn't its camera angles or its level structure, but the way it wins hearts through sheer charm.

"It's true that few videogames can match the delight of one from Nintendo, but no Nintendo game you've ever seen as delightful as this," *Next Generation* gushed in issue 21. "The world of videogaming has just changed forever."

And *Next Generation*'s panel of developers largely agree, "It's hard to say anything critical about *Mario 64*, since almost every element of the game was done beautifully," says Brian Hastings, vice president of technology at Insomniac Games, and contributor to *Spyro the Dragon*. But he stresses it's only a beginning. "*Mario* made some great strides in every area of 3D gaming, so we've taken notes and made what we think are significant improvements while creating a very different game."

Scot Steinberg of Crystal Dynamics (the creator of platformers like *Pandemonium* and *Gex*) echoes the sentiments. "*Mario* is like the



primordial soup from which all life began," he says. "The unique combination of being a new, revolutionary game on a new revolutionary platform makes it a true phenomenon. *Mario 64* can be bettered but hardware technology, software technology, and character design forces will need to be perfectly aligned to do it."

In this attempt to sketch out the 10 tentative commandments, then, let this be the motto: Look first to *Mario*.

2. Thou shalt not make *only* graven images

Game design should be about the interaction, even if it's stripped of visuals

Banjo-Kazooie is perhaps *Mario 64*'s most beautiful cousin. The potent double-whammy of Rare's peerless artists and some improved N64 graphics libraries produced a game of stunning beauty. The most compelling reason to play *Banjo* is to marvel at what's around the corner.

However, there remains a nagging suspicion that, at times, Rare lost sight of the wood for the lavishly realized trees. The visual theme of each world, be it sand, swamp, ice or industrial, has limited the game's conundrums, rather than enhanced them. A reluctance to experiment with environments, allowing gravity to defeat

imagination, runs through the game.

Creating a gorgeous world takes so much energy, it's easy to forget that in the end, gamers can see a better one outside the nearest window. Gaming is about gaming — graphics are a means to an end. "The game has to be enjoyable even if the main character is a flat blue cube," says Naughty Dog's Jason Rubin, creator of *Crash Bandicoot*. "Game design should be about the interaction, even if it's stripped of visuals."

Ubisoft's Pauline Jacquey, project manager for *Rayman 2*, agrees that players can have too much time to admire the view — a leisurely tendency which, in *Mario 64*, sees the hero fall asleep if left to his own devices. "Speed and intensity are at the root of *Rayman 2*. This makes it really different from all the other 3D games where there is nothing to do except admire the scenery. In *Rayman 2* the player hasn't got a second to waste as everything keeps collapsing behind him, and he is either riding a strange animal or is pressed for time, has a lack of oxygen or encounters strong winds."

Visuals are an important part of a 3D platform game. But there is more room for innovation in gameplay and level design than in rendering yet another ice world.



CONTENDER #5



Earthworm Jim 3D

Format: PC/Nintendo

64/PlayStation

Publisher: Interplay

Developer: VIS Interactive

Who would be king?

Dave Perry's

Earthworm Jim

It's *this* close...

Like *Mario* and *Rayman 2*, a veteran character reveals hidden depths

But...

It'll be funnier than *Mario* ever was, with the comic book look of the original games translated into 3D. And instead of ice and water, players navigate through Jim's brain

CONTENDER #6



Croc 2

Format: PlayStation/PC

Publisher: Fox Interactive

Developer: Argonaut

Who would be king?

Croc, a cutesome crocodile

It's *this* close...

A charming 3D character collects crystals that open up new levels

But...

With luck, *Croc 2* will offer a wrinkle-free update of the original, as it enjoys a huge fan base despite mixed reviews. Argonaut claims it had ideas "two years before *Mario* came out"

3. Thou shalt not take on *Mario* in vain

If you're going to make a 3D platform game, go for the throat

"I'm convinced that it's possible to make games that are as good as — if not better than — *Mario*," says Ubisoft's Pauline Jacquey. "Not necessarily from a technical point of view, but in terms of intensity, pacing, and variety of gameplay."

It's a sentiment echoed by Argonaut's Tony Lloyd, who points out that Argonaut began work on *Croc* six months before *Mario* went public. Now working on *Croc 2*, he asserts: "If they'd thought of every single thing that it's possible to squeeze out of 3D platformers, we'd pack up and do something else. I'm positive that 3D platformers are still in their infancy."

Insomniac's Brian Hastings focuses on two weak points. "Some of the areas were very hard, and they had very little interaction with enemies," he says. *Spyro the Dragon* offers a different emphasis. "We're putting the focus on fighting enemies. By putting more enemies in the game, we were able to add a lot of humour and showcase some great animation but also pick up the pace of the game. *Spyro* has a much higher twitch factor than *Mario*."

Admiration for Miyamoto's title can teach many things, but *Next Generation* is certain that, as with the great Western gunfighters, some young gun is waiting for high noon to finish him off. What lesser artists copy, great artists kill.



4. Remember the day of rest

People play games for fun. Entertain us

Take any opportunity to delight the gamer. The myriad little touches in *Mario 64* — the shell-riding, the magic mirror, the cannon travel, a pyramid whose point can be popped off, the seemingly never-ending challenges nesting like Russian dolls — are surely its most endearing traits.

All too often, 3D platform games offer little more than the chance to steer a character through some hopefully swoonsome environments. And, because navigation in a 3D free-roaming world is a pretty difficult task, designers seem reluctant to complicate matters with the sort of hair-trigger challenges favored in 2D games. If the previous

generation of platform games can be generalized as overcoming challenges as they emerge from left to right, 3D platform games are too often just about discovering how to get from A to B.

There's still lots of room for creativity. *Banjo-Kazooie*'s morphing characters introduce a lot of variety into the navigation. *Mario* achieved something similar with its cannons and caps, making sure each journey was an event in itself.

Banjo-Kazooie also introduces variety through the wealth of different skill sets that gamers can call upon. You might argue that *Kazooie*'s ability to scale a steep slope isn't any more interesting than if Banjo could walk up by himself. True, it's not a challenge, but it's a chance to engage the player. Ditto *Kazooie*'s ability to fire egg projectiles.

"*Banjo* could have survived without the egg-firing ability, but it makes the game more interesting," says Naughty Dog's Jason Rubin (the company has studied free-roaming 3D platform gaming hard, while opting so far for a so-called 'two-and-a-half-D' perspective).

"It may seem token, but it serves to make the game more enjoyable," he says. "In *Crash Bandicoot 3*, Crash can fire a bazooka, do a super bellyflop, fly a biplane, ride a baby T-Rex and more. We learned from the first *Crash*, which had a simple, operational set of moves that included only run, jump, and spin, that players wanted more from the character."

CONTENDER #7



Twelve Tales: Conker 64

Format: Nintendo 64

Publisher: Rareware

Developer: Rare

Who would be king?

A stomach-churningly cute squirrel

It's this close

Not so much a *Mario* clone as a clone of a *Mario* clone

But...

More interactive cartoon than platform game, all the characters display a range of emotions and facial expressions, and it includes two different heroes plus two- and four-player deathmatch modes

CONTENDER #8



Space Circus

Format: PC/Nintendo 64

Publisher: Infogrames

Developer: In-house

Who would be king?

Starshot, an intergalactic juggler

It's this close...

A planet-hopping platformer for the Nintendo 64

But...

Space Circus focuses on projectile missile combat rather than the pixel-to-pixel punch ups of *Mario 64*. Starshot is flanked by two robotic sidekicks, who crack jokes and offer hints



5. Honor thy father and thy mother

Remember 2D games? They were good enough for 15 years...

The rush of mediocre 3D platform games has revealed what made 2D games so exciting — specifically speed, simplicity, and precision. In contrast, just moving in 3D can be difficult enough. "As far as Naughty Dog is concerned, there has yet to be a 'free-roaming' game with the tightness of control found in even the worst section of a *Mario* 16-bit title," says Jason Rubin.

The problem lies in the relationship between the controller and the camera. "In 2D, the camera is fixed, so the controls are fixed — left is always left," remarks Rubin. In contrast, in a 3D game, control changes just because the camera moves. Rubin contends that the complexity of simply walking in a straight line makes most 2D gameplay challenges, such as a simple platform jump, impossible right now in a 3D game. "To varying extents, all *Mario*'s gameplay suffers from this problem," he says. The move to 3D, which might seem purely graphical, actually destroys the previous bedrock of platform gaming.

Toby Gard, who at Core Design helped create that other legendary 3D character, Lara

Croft, repeats Rubin's concerns. "Controlling a character in 3D is always going to be harder. Your interface with the computer is 2D — your main movement is governed almost exclusively by up, down, left, and right. This translates far better to the flat plane of your TV than the mental jiggery-pokery necessary to translate joystick movements through a control system into 3D space."

Developers should remember what they're losing before embarking on new projects.



6. Thou shalt not kill the character

The best games have a lot of personality

Despite being 2D, *Abe's Oddysee* boasts as much depth as nearly all 3D platform games. The secret, according to Oddworld president Lorne Lanning, lies in its characterization.

"Platform games are just a vehicle to make a movie and story experience in gameplay," she says. "The platform format allows the developer and the gameplay to focus on character. Bringing them to life, giving them more brains — this is what's going to suck in the rest of the world."

Nintendo knows about creating characters. The rotating Mario face at the start of *Super Mario 64* sets the agenda. Dozens of other touches, from the way Mario rubs his head when he hits a wall, right down to his idle animation strengthens players feelings.

Character creation is a black art. While anyone could have told Psygnosis that the child star of *Rascal* would quickly reduce players to the wrong kind of tears, it's not always so obvious. "In terms of personality, Crash is not what marketing would sell as a 'cool dude'," explains Naughty Dog's Jason Rubin. "Crash is not the brightest, and he is not always in control, but he is loveable."

Character design can't be skimmed on, according to Rubin. "Many characters opt for simplicity to save polygons," he says. Even worse, "some characters out there are simply created by slapping a new colour scheme on an existing character, an animal, or fantasy creature and giving it a cute name."

With *Pandemonium* and *Gex 3D*, Crystal Dynamics has experience of creating both 2D and 3D characters. "At the core of any good 3D experience is a character that feels like it belongs there," says Crystal Dynamics' Scot Steinberg. "If the mechanics were not built for 3D gameplay, or do not exploit the strengths of 3D, then the project will fail."

Toby Gard has a different philosophy, which led to the birth of Lara Croft. "I try to make sure that all the main characters are sexy, whether they are male or female. You should look at them and feel jealous."



7. Thou shalt not commit adultery

Don't screw around with what works

A platform game should be a platform game. Whenever developers tell *Next Generation* that a 3D *Tomb Raider*-style action game is actually an adventure, alarm bells begin to ring. The same might soon hold true for platform games.

Toby Gard defines 2D platform games as a combination of agility-based timing puzzles, secrets, traps, pickups, an intuitive control system, and enemies. All can be retained in 3D platform games, or "Everything but the high score and sideways scrolling," he says.

Move away from these challenges and you're moving into new territory. Great in itself, but remember that a platform game without platforms better have something to replace them. Pauline Jacquey says, "The major shortcoming of 3D is that if the world is too open, it leads to a slack game where, even if immersion is successful, the player isn't really too sure what he's supposed to be doing because the action plods along too slowly."

When creating *Mario 64*, the first thing the designers decided on was the height of Mario in the world. From this followed the length of his jump, the speed he could move and the scale of the scenery. In other words, this revolutionary game was actually built from the bottom up, according to solid platform-style rules. *Crash Bandicoot*, a game closer to the 2D ethic, is equally explicit. "The world is measured in 'Crash' units," explains Jason Rubin. "Crash is one unit wide and deep, and two units tall. This allows us to simplify spatial relationships so that we can create better interaction between the character and the environment."

Insomniac's Matt Whiting says similar rules lie behind *Spyro the Dragon*. "There are hosts of examples of how the game was built to exacting scientific standards," he says. "It is important that each element be just right, but if all the elements can be put together properly, the whole really can be greater than the sum."

CONTENDER #9



Rayman 2

Format: PC/Dreamcast/N64

Publisher: Ubisoft

Developer: In-house

Who would be king?

The original Rayman

It's this close...

Former one-pixel-thin

Rayman now explores a

free-roaming 3D world

But...

Rayman 2 promises to be a much speedier game.

There are also more characters, and more of the hero's weapon (which acts as a grapnel, a lasso, and a means of transport)



8. Thou shalt not bear false witness

Everyone hates the camera in *Mario 64*. Everyone agrees it's the best

Before *Mario 64* and *Tomb Raider*, no one really cared about 3D cameras. First-person games needed only to show the player's point of view. Sports games had the slightly harder task of showing the action from an external perspective, but since the average sports arena is free of mountains, corridors, and other sundry bric-a-brac, the task was pretty simple.

In contrast, a 3D platform game needs a camera that can alter its view continually to compensate for the changing action. As Mario runs down tunnels or slides around mountains, the camera tracks his changing position to stop him disappearing. Common complaints of lesser cameras are that they fail to show the character on screen, that they make it impossible for players to judge angles and distance, and that the camera roams around more than is necessary. But there are a host of other, less obvious problems with 3D cameras.

"Besides *Crash*, which is 3D, but not free-roaming, I still prefer the *Mario 64* camera to the 'overtuned' feeling of the *Barjo* camera and some of the other newer games," says Jason Rubin. "Some complained of feeling sick from the sudden camera movement in *Barjo*. I can't explain it since it didn't happen to me."

Another bone of contention is letting players tweak the camera. *Mario 64* would have been impossible if you couldn't sometimes control the camera yourself. While some feel this is disruptive, others believe it adds extra immersion. According to Insomniac's Matt Whiting, "There are camera controls



in *Spyro*, but I'd be happier if players never feel the need to use them. On the other hand, the ability to look around in pseudo-first person actually enhances the suspension of disbelief."

Can the camera also be used more creatively? Pauline Jacquey hopes *Rayman 2*'s camera will actually be a positive selling point. "One of the challenges was to make a 'director's cut' type of game. There are very many different cameras that are used in a very studied way," she says, with the result being more cinematic than previous titles.

A final issue is that camera design can influence level design. But, for *Rayman 2* at least, "the artists who created the levels graphically were careful not to construct scenes so tightly that the camera couldn't move about," says Jacquey. "In reality, it wasn't really a major constraint because the game designers can always switch to the standard game camera — either a fixed high-angle side view or a low-angle shot. The work is almost comparable to directing a film — except it's interactive, too!"

Camera design is fundamental to 3D platform design. Nobody has got it wholly right yet.

9. Thou shalt not steal, stupidly

Do you even need to make a *Mario* clone?

Should 3D, free-roaming games be made at all?

For *Abe's Oddysee*, Oddworld created a deeply unfashionable — yet successful — 2D game. Why? "It was largely due to the power of the PlayStation," says Lorne Lanning. "We thought fun, gameplay, and creativity were more important than the latest trick in technology. We see that everything we create is going to translate into 3D once the power to deliver the same quality art, animation, and AI is available, but 2D lets us get the ball rolling."

If you want a fast, frantic game, it's easier to get it right in 2D. With *Pandemonium*, for instance, Crystal Dynamics had no doubts. "From the outset, we wanted a fast-paced product that concentrated on endorphin-driven responses, with less concentration on exploration," confirms Scot Steinberg.

Yet even Steinberg admits that Crystal Dynamics would be hard-pressed to do another 2D title. "The



worldwide marketplace has evolved toward the more impressive qualities of 3D. To some extent, the industry magazines have helped usher the end of 2D products by terming 3D to be the cutting edge. Consumer perceptions that 2D is less sophisticated has effectively limited their commercial appeal."

Still, if a developer is prepared to make a 2D game with 3D trappings, there might still be a market, argues Jason Rubin. "*Crash 1* and *2* have sold more units worldwide than every free-roaming platform game but *Mario 64*," he says. "Its sales approach the 2D greats of the 16-bit age. The demand is still there."

10. Thou shalt not covet thy neighbor's house... Thou shalt not covet thy neighbor's wife, nor manservant, nor maidservant, ox, ass, nor anything that is thy neighbor's

Goes without saying, really.

The Three Golden Rules of 3D Platform Game Design

The inspiration for NG's own 10 commandments

Brian Hastings, VP of technology, Insomniac Games

Game *Spyro the Dragon*

- 1 Keep the action in front of the camera
- 2 The terrain determines the gameplay
- 3 Keep the theme of the level simple and focused

Pauline Jacquey, product manager, UbiSoft

Game *Rayman 2*

- 1 Give the hero as many actions as possible
- 2 Give the player clear objectives
- 3 Pacing, pacing, pacing

Toby Gard, founder, Confounding Factor

Game *Tomb Raider*

- 1 Playability
- 2 Utilize your system thoroughly
- 3 Don't make it hard

Tony Lloyd, lead programmer, Argonaut Software

Game *Croc 2*

- 1 Give the player control
- 2 Get the camera right
- 3 Remember the 'wow!' factor

Jason Rubin, president, Naughty Dog

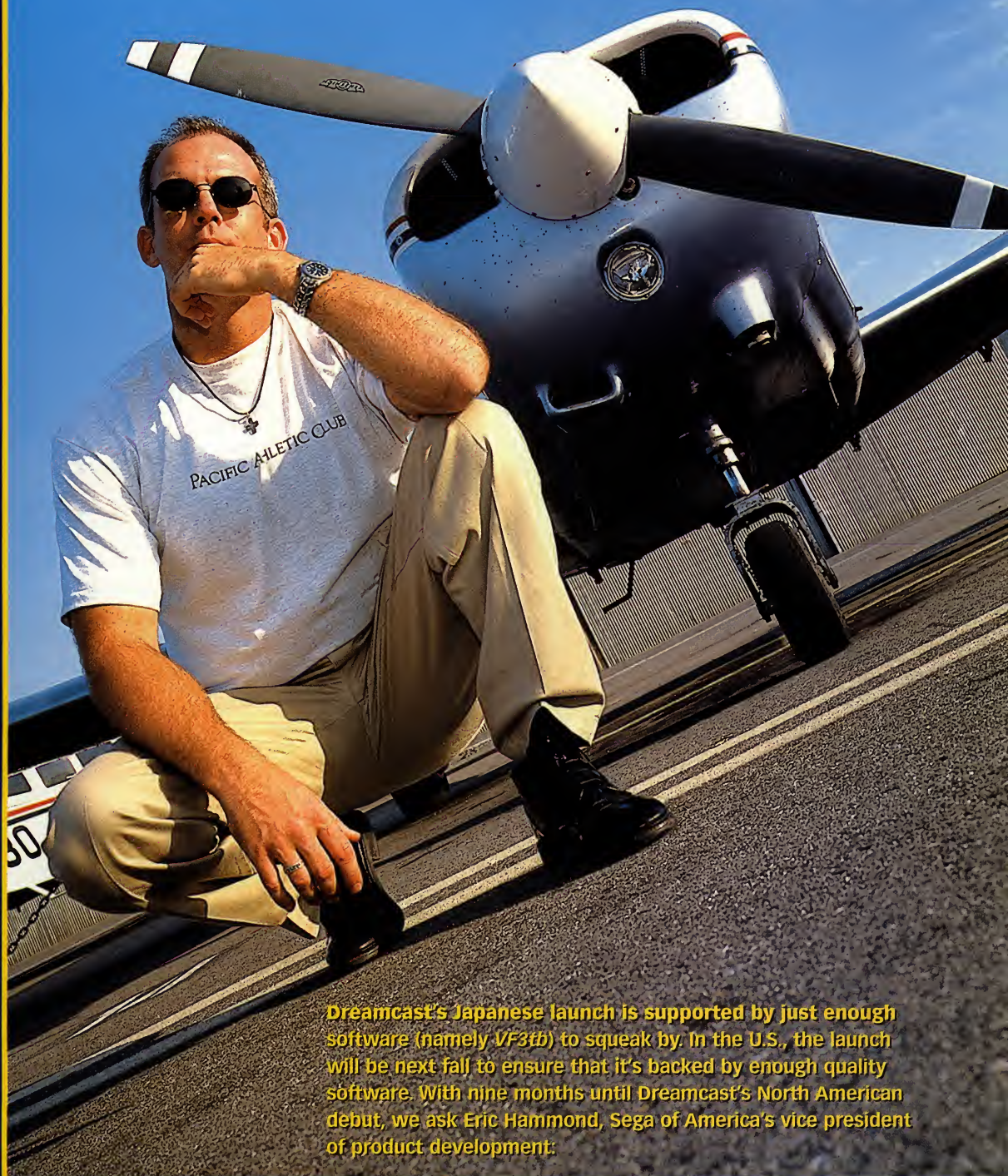
Game *Crash Bandicoot*

- 1 Gameplay
- 2 Gameplay
- 3 Test the hell out of it (you probably got the first two wrong)

Darren Wood, team leader, Interactive Studios

Game *Glover*

- 1 Make it original
- 2 Make it fun
- 3 Make it polished



Dreamcast's Japanese launch is supported by just enough software (namely *VF3tb*) to squeak by. In the U.S., the launch will be next fall to ensure that it's backed by enough quality software. With nine months until Dreamcast's North American debut, we ask Eric Hammond, Sega of America's vice president of product development:

WILL THE U.S. BE READY FOR DREAMCAST?

As one of the game industry's true renaissance men, Eric Hammond may be the most qualified product development executive in history. His first game was published by Online Systems (later known as Sierra Online) as he graduated from high school. After launching EA Sports (and helping EA survive the crash of 1983-84) with *One on One*, he went on to work on 3D at Broderbund, do sound work on the S.C.U.M.M. engine at LucasArts, work at Interplay when Brian Fargo still programmed, and, after a stint in the Navy (where a leg injury forced him to drop out of SEAL training), put in more than 4,000 hours on Saturn development, where he gained an intimate appreciation of the system's shortcomings. We caught up with Eric just before he took off (literally) for some sightseeing around the San Francisco bay.

The Hardware

Next Generation: You've worked all of your life on software, but one of the main reasons you're now at Sega is because you worked on the unreleased Dural hardware. How did you get involved in that project?

Eric Hammond: After I left Leland Corp., I did the sound driver for the Sega CD, and after that I was invited to do a Saturn launch title. The specs on Saturn looked pretty cool. I didn't realize until four or five months after I had gotten into Saturn that it probably could have been designed better. We got the game, *Ghen War*, done, but that was really an interesting period in my life. I learned a lot about 3D, development systems, and what was bad about software development tools. The 32X, which Sega was trying to support then, really hurt the Saturn, because the tools group just had their hands full. I called them all the time, and I ended up actually fixing stuff for them. In mid-1996, I got a call from Sega asking if I wanted to head up tools development for the Dural team, which was the 3Dfx-based console Sega was working on.

NG: Set the record straight on the competing consoles Sega was developing.

Eric: I think Sega wanted to get two groups working to make sure they ended up with something great. We were using 3Dfx hardware and a Hitachi CPU and we actually had a Glide demo running in mid-1997. It was canceled [in favor of the Katana, NEC-powered hardware] later that year.

NG: How different was Dural from what Dreamcast is today?

Eric: Not a lot different. It actually encompasses a lot of what we were doing from a system architecture perspective. See, the teams talked a lot every day, back and forth. Every day, we were both trying to move ahead with our stuff and incorporate anything the other team had done the day before. It was pretty brutal, but it made the platforms stronger. I think Dreamcast is much stronger than either project would have been on its own.

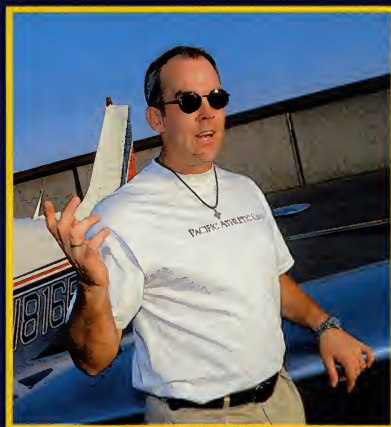
THERE IS NO REASON TO SEE POLYGONS ON THIS MACHINE. YOU ARE GOING TO SEE A LEVEL OF PHOTOREALISM THAT YOU HAVEN'T SEEN EVEN CLOSE TO BEFORE.

NG: Saturn was, to put it bluntly, a mess inside. Has Sega learned from that mistake?

Eric: Absolutely. The competition between the Dural and Katana groups really taught Sega that you have to rely on your technology partners. When you're doing a 100mhz bus, it's really hard to engineer that stuff cleanly, and it's also expensive to manufacture. Sega has learned to rely heavily on its partners for the technology, instead of saying, "we'll create it." That was the big change with Dreamcast, and it's a huge change for the positive. Sega hired high-speed electronics engineers who really understood the stuff so they were able to create a cool system with a clean architecture. Unlike Saturn, Dreamcast is very clean inside — the whole board fits underneath the drive, and it's going to get smaller, too.

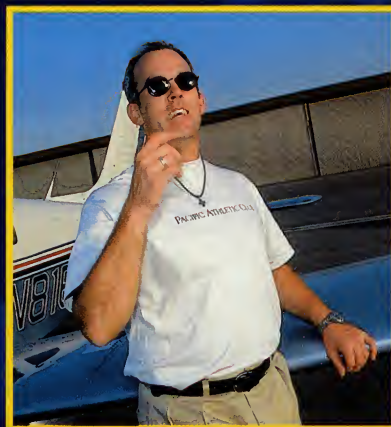
NG: What about development? Is Dreamcast easier to program than Saturn?

Eric: We have one processor. That really helps a lot. [Laughs.] There is one graphics processor instead of two, and a pretty thin API to talk to that hardware. And there are about four major tricks of speed that we are heavily documenting so they aren't hidden. The second-generation PowerVR is a very standard 3D part, even though it uses the tiles and stuff. The hardware interface is very much like any other 3D graphics processor. So when you look at it, it's pretty easy. I don't think it's any more difficult to use than PlayStation as far as writing triangles, but it just has so much more horsepower. It's kind of cool. For the first time, you get to do floating-point



AI: you get to do floating-point 3D. It's just so much fun. It's really cool to have a floating point that you can actually use in a game. It makes it a lot easier. Dreamcast is more complex than the Saturn in terms of its power and capabilities, but it's a lot easier to program.

NG: Dreamcast is going to be the first next-generation system to launch, and it's based entirely on polygons. How worried are you that in 2000, it's going to be completely eclipsed by something else that may have curved surface technologies, such as PlayStation 2?

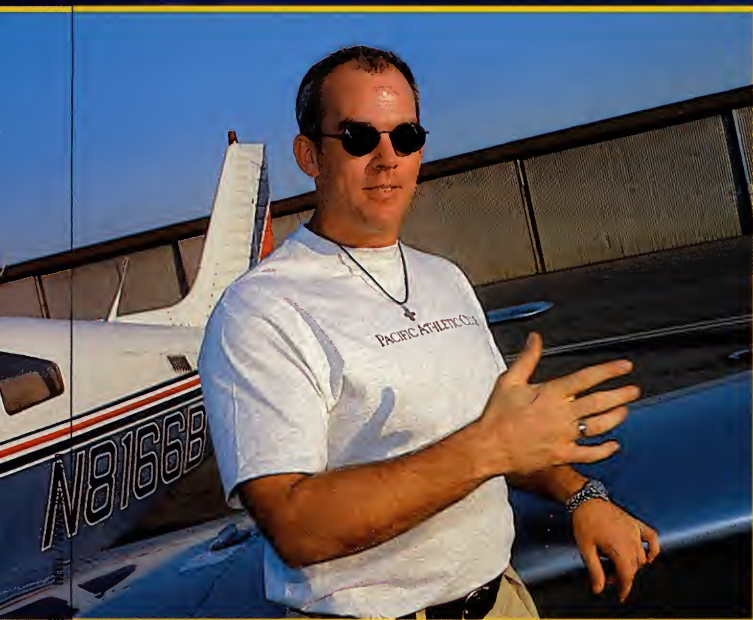


Eric: If you look at PlayStation or Nintendo 64, Dreamcast is basically 10 times as powerful. You can tell where all the polygons are on PlayStation, but on Dreamcast you just aren't going to be able to tell, unless you really look, or the person didn't model it very well. There is no reason to see polygons on this machine. You are going to see a level of photorealism that you haven't seen even close to before. Now, you can do that with polygons, or you can do that with curved surfaces, like NURBS, which are basically 3D patches and curves that you define with control points. NURBS are powerful for compression, and it's pretty cool how they map textures. But they change your entire tool chain and create a whole new learning curve for your artists. So the question then is what can you do with NURBS that you can't do with polygons? The answer is, not much. Visually, it's fairly similar. We're getting very, very smooth surfaces already because of our polygon count.

The Japanese Launch

NG: What about the software that is coming out in Japan? There has been some criticism of the early software there. On paper, the hardware is very powerful, but some of the launch games don't really show that. Sega always maintained that Saturn was capable of more than we were seeing, but we never saw what it could allegedly do. What about Dreamcast?

Eric: There's no comparison between the two. Look, it's very simple: Look at early software on any platform, and then look at software two years later. Right now, I have a sports game running at more than 1,000,000 polygons per second, in realtime, in a real game with AI and everything, and I still get 10 more months to tweak it. So, think about what the next round of software in Japan will be like, as they continue to season and explore the hardware. It's going to be amazing.





NG: If the Japanese launch is weak, will Sega be able to make up for that in the future?

Eric: Oh, God, yes. They could release it with no software, and it will sell when people see Yu Suzuki's *Project Berkeley*. You know what Yu Suzuki's done in the past and that game. It's really [pauses] *next generation*, that's the only way to describe it. AM2 has had so many people on that game for so long, and the results are just incredible. They just have created an amazing world in that game. In fact, I don't think anything released for Dreamcast in the first year is going to come close to it. It's that far ahead.

The U.S. Software

NG: We can count on the top first-party teams in

Japan, such as AM2 and Sonic Team, to deliver top software, but what about in the U.S.? Sega of America hasn't produced a top game since *Sonic 3*, has it? What about *Bug?* *All Star Hockey?*

Eric: Well, that's where I really come in. After the Dural project ended, Bernie Stolar asked me to stay on to run product development. So, I got into PD here, and morale was — morale was pretty bad. It took about four or five months to turn that around. We just focused on Dreamcast and moving forward. It's been very healthy for the last 10 months, and that's a lot different than it was in the early days of Saturn. When I started with Saturn, a couple of months into it, I knew that it had problems.

NG: How many first-party projects is Sega working on in the U.S. right now?

Eric: More than 10.

NG: That isn't a huge number.

Eric: I'm not trying to do 30 or 40 games. I want to do a dozen, or slightly more, at a time, and have a pretty much one-to-one producer ratio, so that a producer doesn't have to worry about multiple projects, or pick favorites to spend his budget on. And I want the producers to look at each other's games. So in way we're overstaffing on producers, but not really, because one may be stronger in design, and another may be strong on the back end and they can help out each other.

NG: Traditionally, Sega has had a bad reputation for producing great first-party software, but not passing on their technology to third parties. Is this tradition going to continue?

Eric: That was true, but now it's really different. It's strange for me as a first-party guy to be saying this, but I think making sure you give third parties



everything you can is 100% crucial to our success. Sony has a really bullish first-party policy of just wanting it all for themselves, and Nintendo is ten times worse. But I think this time around you will see a much friendlier Sega, technologywise. On Dural, I

WE HAVE THE HARDWARE, WE HAVE THE TOOLS, AND WE BASICALLY HAVE NINE MORE MONTHS TO GO BEFORE WE SHIP. THE GAMES ARE JUST GOING TO BLOW PEOPLE AWAY

was in charge of tools, and it's still a huge area of interest for me.

NG: Will Sega of America be sharing their tools?

Eric: Internally, we've developed some pretty cool things. I'd really like to share them. If we've developed these tools, I feel as though we have an obligation to share and support them. We'll have to see how it works out, though.

NG: What about Windows CE? Is anyone using it?



Eric: We have a couple of developers using it right now. It's actually turned out to be pretty fast. I missed E3 because I was in Japan programming in CE. I took over a team to manage and I ended up helping to code a graphics driver for CE. I got pretty intimate with it, and I realized that it's pretty good. Obviously it takes memory, and it takes some CPU cycles, but for anything heavily Internet orientated, it's great. And it's a great help for getting traditional PC developers into the system.

NG: How many games will have a heavy Internet component?

Eric: We'd like to have a small part of it in every game. It's kind of cool; you get to a point in the game, and it calls and registers your score. Or you can see actual score updates in realtime in sports games. There are a lot of applications that aren't full-blown Internet applications.

NG: How important is the Internet to Dreamcast?

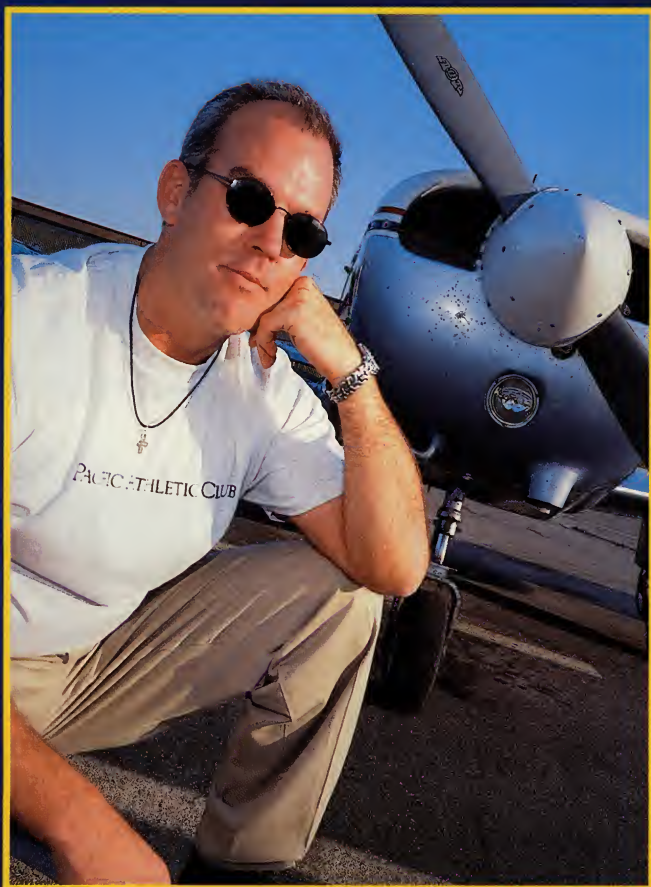
Eric: It's obvious to our customers that this machine can be used for things other than games. But if we tried to push all that non-game stuff, I'm worried that we'd lose our focus in consumers' eyes, because we'd be trying to do too much. With this machine, it's all about the games, period. We're in such a great place. We've been working for 10 months and we have the hardware, we have the tools, and we basically have nine more months to go before we ship. The games are just going to blow people away.

One on One

NG: *One on One* is one of the greatest sports games ever made. Are you tempted to do it on Dreamcast?

Eric: Well, from a competitive standpoint, I don't want EA coming out with it! [Laughs.] But you know, if you spent a year on it, and did all the motion capture with two guys, instead of trying to do a whole team, you could do something pretty great with guys who had *Virtua Fighter*-level polys. [Smiles.] I kind of want to steal some motion capture data from Visual Concepts. It would be fun to try as a project...

NG



Live the experience!

the Live! experience.



awesome
AUDIO



explosive
GRAPHICS



thrilling
PC DVD



sensational
SPEAKERS



It's a totally different way to stimulate your senses.

The Live! experience is a totally different way to interact with your PC. Our multimedia upgrades take you places you've never been. It's seeing and hearing for the first time. It's being there without ever leaving your seat. It's the adventure of a lifetime. Turn your PC into an extraordinary entertainment center — at an incredibly affordable price.

CREATIVE®

www.soundblaster.com/golive/

ASK ASCII GUY

2:

DEAR ASCII GUY,

MY GIRLFRIEND SAYS I'M "2-DIMENSIONAL", AND ALL I CARE ABOUT IS PLAYING FORSAKEN™, NFL™ BLITZ, AND DUKE NUKEM™ TIME TO KILL™. I GOT TO THINKING ABOUT IT - AND SHE'S RIGHT! I AM 2-DIMENSIONAL. I PLAY 3-D GAMES WITH A 2-D CONTROLLER. HOW CAN I GET SOME DEPTH?



1:

Don't sweat the chicks my friend. What you need to do is get your hands around the new ASCII Sphere 360™. It's the only way to really get 3D, and it's the first intuitive 3D controller for the PlayStation® game console. The ASCII Sphere 360° senses all pushes, pulls & twists that you apply to it and translates those commands instantly into fluid, smooth movement. BAM! You're bustlin' crazy moves effortlessly. And check this out- games like Forsaken, NFL Blitz, and Duke Nukem Time To Kill are programmed to groove with the ASCII Sphere 360°. With game play like this, who needs a girlfriend anyway?



ASCIIWARE™

Imagine the Possibilities

Customer Service 650.780.0166 www.ascient.com

Produced under license by Sony Computer Entertainment America for use with the PlayStation game console. © 1998 ASCII Entertainment Software, Inc. All rights reserved. ASCIIWARE is a registered trademark of ASCII Entertainment Software, Inc. ASCII Entertainment, ASCII Sphere 360°, and the ASCII Sphere 360° logo are trademarks of ASCII Entertainment Software, Inc. PlayStation and the PlayStation logos are registered trademarks of Sony Computer Entertainment Inc. All other brand and product names are trademarks and registered trademarks of their respective holders. FORSAKEN © 1998 Accolade Entertainment, Inc. All rights reserved. NFL™ BLITZ™ Game © 1997 Midway Games Inc. All rights reserved. BLITZ and MIDWAY are trademarks of Midway Games Inc. © 1997 NFL: Team names and logos are trademarks of the teams indicated. The NFL shield, Super Bowl and Pro Bowl are trademarks of the National Football League. Officially Licensed Product of Players Inc. Players Inc. logo is a registered trademark of the NFL Players. Distributed by Midway Home Entertainment, Inc. Duke Nukem™ Time To Kill™ © 1996, 1997, 1998 3D Realms Entertainment. All Rights Reserved. Developed by n-Space, Inc. under sublicense from GT Interactive Software Corp. under license from 3D Realms Entertainment. Published and distributed by GT Interactive Software Corp. All other trademarks are property of their respective companies.



Lara Croft is back for another turn and loving it,
while a whole crop of new titles **sure to please**

FINALS

The definitive opinion on the latest releases

Next Generation's reviews are simply the best in the business. Thorough, unbiased, and professionally written, they're the one source you can trust implicitly. If we say it's so, then you can bet it's so.

★★★★★

Revolutionary

Brilliantly conceived and flawlessly executed; a new high watermark.

★★★★☆

Excellent

A high-quality and inventive new game. Either a step forward for an existing genre or a successful attempt at creating a new one.

★★★☆☆

Good

A solid and competitive example of an established game style.

★★★☆☆


Average

Perhaps competent — certainly uninspired.

★★☆☆☆

Bad

Crucially flawed in design or application.

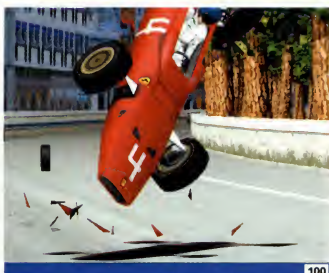
 Denotes a review of a Japanese product.



96



98



100



102



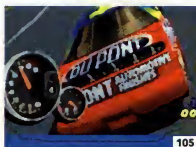
109



104



104



105



105



105



106

96 Tomb Raider III PC, PlayStation
Lara returns, as good as ever

98 Silicon Valley Nintendo 64
Take 2 offers up a quirky hit

100 Grand Prix Legends PC
The most dangerous racing game ever

102 Xenogears PlayStation
Square's latest is incredible

Brave Fencer Musashi PlayStation **104**

Bushido Blade 2 PlayStation **104**

Crash Bandicoot: Warped PlayStation **104**

Knockout Kings PlayStation **105**

NASCAR 99 PlayStation **105**

NHL 99 PlayStation **105**

Psybadek PlayStation **106**

Wild 9 PlayStation **106**

X Games Pro Boarder PlayStation **106**

Dethkarz PC **107**

Dominant Species PC **107**

Commandos PC **107**

Urban Assault PC **108**

Knights and Merchants PC **108**

Hexplore PC **108**

VR Baseball 2000 PC **109**

Deadly Arts Nintendo 64 **109**

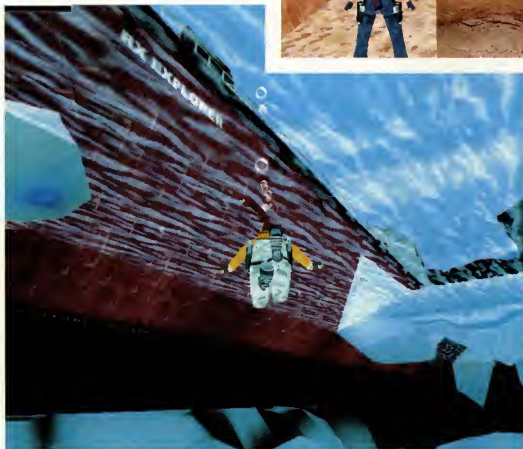
Rush 2: Extreme Racing USA Nintendo 64 **109**

We were ready to be let down, but damned if Core didn't go and make us **fall in love all over again**



TOMB RAIDER III

Publisher: **Eidos Int.**
Developer: **Core Design**



The graphics look similar, but better (all screens are from the accelerated PC version)



We admit we had some doubts, but this latest installment's excellent design sold us



Tomb Raider III wrings honest mileage out of its well-established gameplay

more impressive than the timetable is how much better the game is in certain key places. While there are no earth-shattering innovations in *Tomb Raider III*, much work was put into improving the overall experience. All those things that make the series shine when it's at its best — bigger-than-life environments, carefully planned secrets and level design, hair-raising predicaments, subtle but rewarding hints and guidelines, and of course, the sheer audacity of its lead character Lara Croft — are out in full force, and players will be more satisfied than ever with the results.

Like the second installment of the series, *Tomb Raider III* doesn't make it easy for newbies. This is a game designed for experienced players, and those who have never tried their hand in the *Tomb Raider* universe should expect to fumble around for a while before really getting in tune with the subtleties that make this game so rewarding. For experienced players, expect to be challenged from the very first level. What will help players of any

experience level get into the game is an even better set of FMV and realtime animation sequences, which perfectly set up the action as they reveal the details of the storyline.

One of the few important departures from earlier efforts comes in the form of a nonlinear level sequence. All players will begin and end in the same spot, but in between there is a new freedom to choose in what order to play through the levels. This new option does offer gamers the chance to customize the adventure a little more to their liking, but in the end, it still delivers all the same pieces.

Also added to the game are a variety of new weapons and enemies, including some particularly tough boss characters. While the first two games seemed to skirt around the idea of end-of-level bosses, *Tomb Raider III* makes no effort to hide this classic videogame convention, and, for the most part, succeeds with some pretty deadly foes. Along with the bosses comes an invigorated effort to add some



It's amazing what a few tweaks and a bit of creativity can bring to what is, let's face it, an aging engine and firmly entrenched game mechanics. Aw heck, who are we trying to kid — here's a bunch of gratuitous shots of Lara Croft's ever more curvaceous butt

much-needed visual flair. While the environments have always looked great, there has never been much in the way of special effects graphics in the series. The end-of-level bosses change that with some dazzling weaponry that lights up the screen (and shows off 3D cards nicely).

But what really puts *Tomb Raider III* back in the same class as the original is the level design. Yes, the environments look great, and while the sheer size or complexity of some structures might be enough for lesser games, in *Tomb Raider III* this is only the starting point. What really makes each level special is how everything fits together, and how the design leads the player through the mazes, puzzles and action sequences until they finally reach the end.

To paraphrase a popular cliché, level design is in the details, and the little things about the design are what really make it work so well this time — things like being able to see your next objective (a key or a doorway, say) off in the distance as you reach a plateau in the first part of a level. Of course, experienced players know that just being able to see the item doesn't mean it's going

to be easy to get, but it gives them just enough of a clue to get started in the right direction. This element of the design was too often missing in the second installment of the series.

The level design is also full of pleasant surprises that demonstrate a very clear understanding of the expectations that come along with the third installment of a game series. One such example is a giant waterfall, which, by all conventional *Tomb Raider* thinking, would drop Lara to her death, but instead drops her to a hidden platform which leads to the next area of the level.

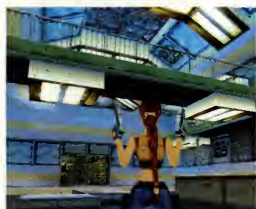
By keeping the rules fresh in this way, the designers enable players to feel like they're exploring something new and exciting — not just an extension of what they've seen and done before.

One of *Tomb Raider III*'s biggest pitfalls (at least on the PlayStation and unaccelerated PC versions) comes from the sheer busy-ness of the graphics, specifically the design of the texture maps. As was the case in the two previous games (and despite an improved resolution), there are several spots in *Tomb Raider III* where it becomes difficult to make out the details of a level because there is just too much going on in the textures. This is especially problematic in the monochromatic desert and Antarctic zones. This is not an issue in the accelerated PC version, which boasts a far better resolution for its textures, but PlayStation owners should consider the issue before they make a buying decision.

To have *Tomb Raider III* so soon after the last, it would have been almost too easy to expect a long list of shortcomings (especially given the dismal demo shown at E3). But thanks to what must have been an almost inhuman effort, no one will be asked to accept anything this year from the *Tomb Raider* series except the biggest, and arguably, most rewarding, game yet.

RATING

★★★★☆



Although the series has never been known for flashy special effects, *TRIII* throws in a few



Once again, the designers at Core have given Lara some truly outstanding environments to run around in



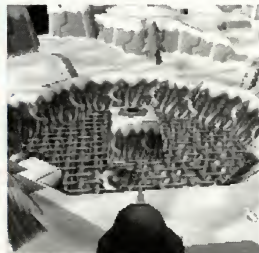
Take 2 and DMA Design offer up a quirky, and definitely different title that's **one of the best for N64**

SPACE STATION: SILICON VALLEY

Publisher: **Take 2**
Developer: **DMA Design**



If you're looking for something different, this is it — possessing turtles with guns growing out of them is one possible action in this game



Although it takes place in a space station, the game's environments are nicely varied



for more than 1000 years, *Silicon Valley* is infested with oddly evolved robotic animals. Entire species, from dogs and rats to elephants and camels, fill the many worlds that encompass the giant space station. And over the years, breeds have mutated again and again, rendering themselves into new animals entirely. Imagine rats that drop exploding feces, hovering sheep, motorized walruses, dogs that fly and shoot rockets, scorpions that blast off bolts of lightning and much, much more — your basic army of superenhanced, robotic beasts.

Because *Evo* is nothing more than a walking microchip, the robotic animals that populate *Silicon Valley* make for ideal hosts. In fact, the entire space station provides a virtual smorgasbord of bodies for the parasitic chip to possess. But there's a catch: Before *Evo* can assimilate an animal, it must first be killed. And let's face it, a microchip with legs is hardly a match for an oversized lion or, for that matter, a harmless sheep. And so it's really quite lucky for the little guy that, upon entering the space station, his ship crash-landed on a dog, killing it. Jumping into the pooch, *Evo* begins his climb up the evolutionary ladder.

DMA Design has created a

Meet Flossy. She enjoys grazing and staring blankly into the wind. She's a sheep, of course, and she's in love with a dog named Roger. Society hasn't been easy on the lass and her companion; sheep/dog relationships are, after all, considered a sin — even on long lost space stations floating millions of miles away from anywhere. But Flossy and Roger cannot fight the love they feel for one another. Against all odds, they decide to give it a shot.

It's just after the couple has kissed that gamers begin to understand what DMA Design's *Space Station: Silicon Valley* is all about. Roger, overcome with joy, is bouncing around happily when a giant ship comes crashing through the outer shell of the space station and lands on the dog, smashing him dead. Flossy, witness to her lover's demise, begins crying. Meanwhile, *Evo*, the robot copilot of the intruding ship is suddenly

ejected out of his chair and sent soaring into the ceiling above, where he shatters into a plethora of pieces, exposing an inner microchip that falls back to the land below. In search of a body to inhabit, the chip jumps into the recently deceased Roger. It's sick, wrong, and hilarious — and it's only the beginning of what this wonderful game has to offer.

Players assume the role of *Evo* on a journey to discover exactly who or what is running the ancient space station and, with any luck, alter its collision course with Earth before it's too late. Aiding *Evo* on his quest is Dangerous Dan, the aging, decidedly nerdy, somewhat pathetic pilot of the recently crashed ship. The team (of sorts) is Earth's only hope. *Evo*, now in microchip form, lumbers his way around the station with Dan working the ship.

The ancient station isn't without its dangers. Lost in space



The game's puzzle design and "logic" are as strange as its character and level design



Silicon Valley's graphics are simple, but colorful and clear, and the environments are often huge

well-balanced planet of animals, each breed possessing its own strengths and weaknesses. The idea behind the game is to progress through each puzzle-like level using specific animals for various objectives, thus playing to the strengths of one breed while dealing with its weaknesses at the same time. For example, a dog with rockets may boast the weaponry needed to defeat an entire farm of sheep, but it can't jump, therefore it

cannot cross gaps. On the other hand, the sheep, which hover, are perfect for floating over dangerous surfaces. Using a combination of animals to complete tasks is both a necessity and a satisfying challenge.

Level design is superb. The game consists of four huge overworlds and more than 35 sublevels ranging from Desert and Europe to the Jungle and the Arctic. Specific animals can be found in their related environments. Penguins frequent the icy regions of the Arctic world, whereas camels roam the hot sands of the Desert area. The Scottish developer has designed each level in a fashion that doesn't dictate to players how it must be completed. The idea is to experiment, find the correct animal for a particular undertaking and execute it. Each level becomes steadily more difficult. The game's second level places players as a robotic dog, which must round up a group of scared sheep into a gated area. It's a fairly simple process. A much later level sees players as a hyena that must laugh at enemies, coercing them into activating switches that it cannot reach itself, then progress through a mazelike volcanic region.

Silicon Valley doesn't push Nintendo 64's hardware to the limits in the visual department, but that's not to say that the game doesn't employ some nice graphic effects. The 3D polygonal worlds are bright, colorful, cute, and deliberately simplistic. Imagine *Super Mario 64* with a touch more pastel. Animals, which seem to be made of only a few polygons here

and there, are actually quite amusing, if only because they're so out of the ordinary. Sheep, puffy and visibly stupid, blink mindlessly; apes pound their chests sporadically; huskies snap their jaws, chopping at nothing. Subtle, but effective realtime lighting effects, precolored lights, transparencies, and more combine to create an overall polished look. However, the game's 3D engine is not without its faults. A sometimes frustrating camera system can be confusing and mild slowdown is noticeable.

Space Station: Silicon Valley is easily one of the most refreshingly original games ever to hit Nintendo 64. The game is clever, witty, and

even a little wicked, especially by N64 standards. Levels are well-designed in a semi-nonlinear style, enabling players the option of exploring, experimenting, and killing anything. Bright and cheery visuals fit the game perfectly, and despite a few minor camera issues, the game's 3D engine works just fine.

This game hits the mark perfectly, mixing nostalgic "old-school" gameplay mechanics with a tight, next generation 3D engine. Avoiding *Space Station: Silicon Valley* is turning a blind eye to one of the very best Nintendo 64 has to offer.

RATING



Holding the Z button delivers a first-person-like view, but the camera works fine on its own



In the end, *Space Station: Silicon Valley* is quirky and more than a little bizarre, but it's also one heck of a good time





Sierra and Papyrus deliver what could very well be
the **most dangerous racing game** ever made

GRAND PRIX LEGENDS

Publisher: **Sierra Sports**
Developer: **Papyrus**



Tragedy in Monaco: When you first start playing, expect to see a lot of crashes like this — or even worse

This is what all games should be like. By faithfully simulating the most dangerous Grand Prix season in history, the game enables you to experience something that you simply never could in the real world. Many games try to do that, but few offer a scenario as compelling as *Grand Prix Legends*.

The game has a simple goal: meticulously recreate the 1967 Grand Prix season. With only three minor exceptions Papyrus has managed to license all the teams, tracks and drivers from 1967. (Cooper and Honda have been replaced by fantasy teams Coventry and Murasama, and the dull 1967 French track has been replaced by the more exciting one from 1968).

What was so special about 1967? It was the last year before ground effects (wings and tails, etc.) came into racing, which means cars weren't held down by aerodynamics around turns. Any mishap at speed could easily send a car launching through the air — often with fatal results. And purists say 1967 was the last year that driver skill was far more important than the car in determining success.

Papyrus has delivered its most



Although the learning curve is steep, the replay value is almost infinite, especially with eight-player LAN and Internet play included



accurate physics engine yet for the game; each wheel and force is modeled independently and the result is amazing accuracy. This accuracy, however, does make the learning curve steep — without feeling the forces that an actual driver feels in the car, learning to control the cars is *harder* than the real thing. Expect an hour or so of frustration before you get the swing of things, and start with the detuned trainer cars. The game comes with a strategy guide, and while it's not required reading, you may want to check it out if you have problems. System requirements are minimal, but be warned: the game only supports 3Dfx and Rendition. With either of those, the game is beautiful, but without them, well, it makes you remember why you got an accelerator in the first place.

The races themselves are amazing. The physics are near perfect (which results, by the way, in very watchable crashes) and the AI is among the most advanced we've seen. That means that instead of racing around the track perfectly, AI drivers drive like humans, having

good runs and bad runs, and occasionally wrecking. Although the tracks and cars seem nearly perfect, the crowds and backgrounds are unanimated and flat. It doesn't detract from the fantastic racing experience, but if someone is watching over your shoulder, expect a comment or two.

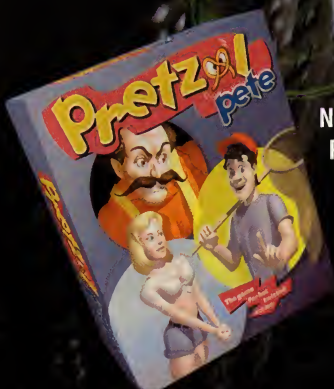
About our only other complaint is the replay feature. Papyrus has kept the camera views almost too faithful to 1967 — there are a few views from in the car (driver, gearbox, roll bar), and two non-movable track cameras, but no overhead views or ways to zoom in. Nothing is more frustrating than performing a brilliant pass (or crash) and not being able to see it again.

Still, that's a minor problem. Overall, there aren't enough adjectives to describe how excellent this is. If you're willing to make the investment it takes to become good, you'll be rewarded with what is perhaps the most exciting and engaging racing game we've ever had the privilege to play.

RATING



Be Afraid! Be Very Afraid!



Never before has such a twisted plan been baked! Help Pretzel Pete™, armed with his powerful Pretzel Net and mighty Mustard Cannon, rescue humanity from pretzel purgatory! Roll through torturous levels, battle half-baked bosses, and crunch up to 16 wicked opponents over the internet as you clean up the wild and mind-blowing levels!

- Battle against your friend on the same PC, or...
- Wage war against 16 opponents over the internet
- Supports the hottest 3D accelerators
- Mind-blowing 3D graphics

www.xsivgames.com Toll Free 1-877-478-3258

Buy it
NOW
online!





After all the controversy and fan outrage,
Square delivers its best RPG since FFXII

XENOGears

Publisher: **Square Electronic Arts LLC**
Developer: **Squaresoft**

When U.S. gamers first heard about Squaresoft's latest RPG, *Xenogears*, it was in a press release from Square's Japanese offices stating that the game would most likely never make it to the States due to "sensitive religious issues." Without even knowing what the game was about or what it looked like, hardcore RPG fans in the US were in an uproar and promptly set about petitioning Squaresoft to change its mind. Then came Square's much publicized joint venture with publishing giant Electronic Arts and suddenly *Xenogears* appeared on the U.S. release roster. After so much hype



The detailed mix of sprites and 3D environments provides an interesting, and very effective, look and style



The combat sequences are spectacular events enabling you to use your massive Gears for stunning showdowns

and subtle controversy, does *Xenogears* live up to the furor over its release?

Answer: Absolutely.

At the outset of the game, you are thrust into the world of the young, reluctant warrior, Fei Fong Wong, as his brief but peaceful stay in a remote village is shattered by warfare and tragedy. With no memory of his life before his stay in the village, Fei is forced to confront the violent mysteries of his past while attempting to make sense of the wars of the present. The original storyline is top notch, with enough melodrama and deep characterizations to compete with the

reigning role-playing champ, *Final Fantasy VII*. Though it has countless plot twists and more than its share of Biblical references, the heart of the game is the mystery of Fei's true identity. Along the way to unraveling the mystery, there are plenty of those rare "gaming moments" that leave a distinct impression on the gamer and ensure *Xenogears* classic status.

Technologically, the game makes a unique visual statement by using sprites instead of polygons to illustrate Fei's world. Although the environments are 3D, characters are made up of finely detailed sprites, which never detract from their expressiveness onscreen. Characters are able to run, jump, and climb, much like in an action RPG and these abilities are put to the test in certain areas, creating an interesting diversion from standard exploration and dungeon navigation. But despite this subtle feature, nothing within the actual mechanics of gameplay is particularly innovative — until you enter into battle.

Combat sequences are entirely unique due to a number of different factors. Though still turn based, Square has taken a new approach by enabling players to string together a series of attacks that can be manually entered into the controller during a character's turn. This adds much more interaction during the typically stoic traditional

turn-based fighting systems in RPGs. But one of the best elements of combat here is your ability to battle certain enemies with your character's individual "Gear" or mech, which changes not only the scope of battle, but many of the mechanics of it, as well. The variety of approaches to a single battle and the numerous unique features that the player is able to utilize during combat places *Xenogears* at the head of the current RPG pack.

Even with so many interesting elements incorporated into *Xenogears'* gameplay, it's ultimately the game's story that will really draw in the player. And with a incredibly strong tale to support all of the pretty pictures and clever designs, *Xenogears* is one title that cannot be passed up. No gamer can afford to miss it.

RATING

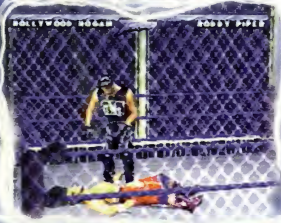
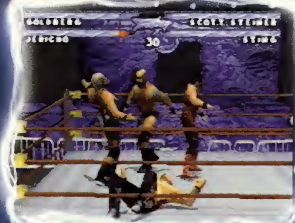


Despite its innovations and epic storyline, *Xenogears* still puts you in a party with other wee folk following you around

FEEL THE POWER

WCW/nWo

THUNDER



"Make your enemy feel the **BANG** as you beat him mercilessly with everything from briefcases to stop signs."

- Diamond Dallas Page

- Choose from over 60 WCW and NWO Wrestling Superstars, including Hollywood Hogan, Goldberg, Kevin Nash, and Diamond Dallas Page!
- Signature Moves, Tons of Weapons, and the No-Escape Justice of a 15-Foot High Steel Cage!
- Full-Motion Video Entrances and Exclusive Rants!



www.thq.com
www.WCW.com

©1998 World Championship Wrestling, Inc. A Time Warner Company. All rights reserved. WCW™ and NWO™ are trademarks of World Championship Wrestling, Inc. All characters depicted are trademarks of or used under license to World Championship Wrestling, Inc. PlayStation and the PlayStation logos are registered trademarks of Sony Computer Entertainment Inc. All rights reserved. THQ™ 1998 THQ INC.



BRAVE FENCER MUSASHI

Platform: **PlayStation**
 Publisher: **Square Electronic Arts LLC**
 Developer: **Squaresoft**

Take a legendary figure from Japanese history, then cast him as a feisty, superdeformed samurai in a quirky action RPG, and you have Squaresoft's latest title, *Brave Fencer Musashi*. After being summoned from the past by a bubble-headed princess, Musashi must collect five elemental scrolls and take down the evil Thirstquencher empire in order to return to his own world. While not the most complex or ingenious plotline, and backed by less-than-snappy graphics, *Brave Fencer* remains lighthearted and engaging.

It's the gameplay that draws in players by incorporating a few clever features and relying on the challenge of good old-fashioned arcade skills. Within his 3D environment, Musashi is able to wield two different swords, each with their own attributes. The legendary Lumina sword enables Musashi to perform devastating elemental attacks. His other sword, Fusion, enables the player to assimilate different abilities from assorted

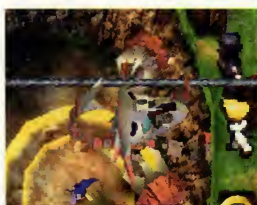
enemies — an interesting wrinkle.

In addition, the game also runs on a pseudo-realtime 24-hour clock that controls many of the different events that happen during play. Certain townspeople and shops are only accessible during specific hours of the day, and this spills over into many of Musashi's different quests. It's an inventive factor that adds a little depth to an otherwise simplistic and straightforward adventure.

While *Brave Fencer* is very entertaining and enjoyable, the game's cutesy, platformish look doesn't necessarily satisfy. The polygonal characters and environments are also not as graphically polished as other landmark titles on the PlayStation. But don't let initial impressions fool you. At the heart of *Brave Fencer* is an engaging and challenging (if somewhat simple) journey with some very clever features and an endearing cast.

RATING

★★★★☆



Like in any good action RPG, *Brave Fencer Musashi* plays host to a large number of difficult and massive boss enemies

BUSHIDO BLADE 2

Platform: **PlayStation**
 Publisher: **Square EA**
 Developer: **Light Weight**

We gave the Japanese version of *Bushido Blade 2* five stars in **NG 43**, and we're pleased to say that the game has lost nothing in the translation. To recap, the game's basic concept — realistic Japanese sword fighting without life-meters, time limits, or artificially small arenas — remains the same as in the original *Bushido Blade*. Matches end only when a fatal blow is struck by one opponent.

Beyond that, though, almost everything else from the first game has changed. The control scheme is entirely new; deeper and slightly more complex, and should appeal more to fans of traditional fighting games. Also, colored flashes now indicate the result of clashes: whether an attack was successful (orange), minor (green), blocked (blue), or fatal (a satisfying spray of red). The plot focuses on the 800-year-long battle between two Japanese sword fighting schools, and while there are only six selectable characters at the beginning of the game, 16 more characters can be unlocked in story mode. The story mode is longer and features more combat (and more story) than the original. Although some of the elegance and simplicity of the original is lost in this sequel, the new depth of the game more than makes up for it. The bottom line is that this is one of the few times we've seen a sequel match its predecessor in originality. This game belongs on every serious PlayStation fan's shelf.

RATING

★★★★★



***Bushido Blade 2* is one of the few sequels that's actually more original than its predecessor**

CRASH BANDICOOT: WARPED

Platform: **PlayStation**
 Publisher: **SCEA / Universal Interactive**
 Developer: **Naughty Dog**

Another year of PlayStation brings us to yet another installment of the *Crash Bandicoot* series. This new edition, as has become tradition, brings us another enhanced graphical engine and several new gameplay mechanics. However, it is, for better or for worse, still a *Crash Bandicoot* game at its core and people who have played the first two games should know exactly what to expect.

This version has Crash making his way through history in 25 levels (plus

some secret ones) recovering crystals and fighting off the occasional boss with his assortment of platform game maneuvers. This time around the mechanics of the game have been enhanced a bit with the addition of several new moves that are earned from each boss, including an apple-shooting bazooka, a double jump, and a run, among others. There are also a whole host of new level types including motorcycle and Jet Ski racing and biplane flying. While each of these levels

is technologically excellent and they do break up the monotony a bit, they are unexciting and do little to help the game. In fact, since the gameplay styles are so radically different from the standard *Crash* fare, we can easily see players becoming irritated or frustrated by having to pass these levels.

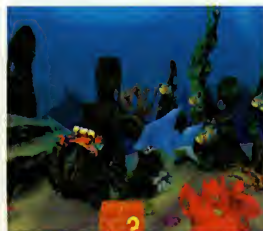
The biggest change from last year, sadly, is the difficulty level — the game is far too easy. Some would argue that there's fun to be had in going back and making sure you find all of the gems and secrets on each level, but to us, revisiting old levels gets tedious very fast.

Still, after you beat the game there is a surprisingly addictive time-trial mode that allows you to race through each level and try to get the best time. This mode adds quite a bit of life to a game that ends fairly quickly.

Overall, what can we say? It's *Crash*. Technologically brilliant with tight, if not uninspired gameplay, when you buy *Crash Bandicoot*, you know what to expect.

RATING

★★★★☆



The majority of the levels will be familiar to people who have played a game in Naughty Dog's *Crash Bandicoot* series before

KNOCKOUT KINGS

Platform: **PlayStation**
 Publisher: **EA Sports**
 Developer: **Press Start**



Unfortunately, great fantasy matchups such as Oscar De La Hoya vs. Jake "Raging Bull" LaMotta do not a great game make

In the history of **Next Generation**, two EA Sports games have graced the cover of the magazine. The first was the never-shipped *Madden '96* for PlayStation, and the second, *Knockout Kings*, falls into the "shouldn't-have-shipped" category.

Electronic Arts licensed a whopping 38 pro boxers for *Knockout Kings*, but that apparently didn't leave much of a budget for the game's development. The problems begin with the boxers themselves; their movements are wooden and they lack real expression. Worse are the poorly realized round-card girls, who border on mutant and should have been cut from the game.

While the motion-capture animation makes for some great knockdowns, the standard punching moves and general controls have been

poorly integrated. Both lack grace, snap, and fluidity, and even general movement in the ring is awkward and unresponsive. But the root of the problem is that you never really feel empowered as a boxer because the collision animations are so ineffective. Hitting an opponent just isn't rewarding. The game sorely misses the excitement of the sport, and in turn, fails to make it fun.

Ultimately, the game tries very hard to capture the authenticity of the sport, and it is noteworthy that it is the first to present multiple weight classes. It seems fitting the only boxer EA didn't license for *Knockout Kings* (other than Tyson) was Marlon Brando's character from the film *On The Waterfront*. Like Brando's character, this game "could've been a contender."

RATING

★☆☆☆☆

NASCAR 99

Platform: **PlayStation**
 Publisher: **EA Sports**
 Developer: **Stormfront Studios**

As a racing game, *NASCAR 99* isn't going to appeal to the likes of the *Gran Turismo* crowd, lacking the speed and visual beauty of Sony's blockbuster, but it does require the same amount of driving skill and endurance. Much like other games in the EA Sports line, *NASCAR 99* is a complete simulation. The driving model is tight, and controls well with the analog stick. Most races aren't won by a superstar racing around the track, but by a consistent driver that slowly moves up the rank from position to position. Both patience and skill are needed to win.

Improvements over *NASCAR 98* are minor, but appear in just about every area of the game. There are more cars, more tracks, and more options. The visuals have been upgraded to present a cleaner look, and the game now supports the Dual Shock analog controller.

Racing strategy still plays a key role in the game both on the track and before the race. Players are able to customize their cars in order to best prepare for the competition. A number of vehicle settings, from shocks to the amount of fuel in the car at race time, can be modified and tweaked. Customizing a car before a race can mean the few critical seconds between winning and losing. On the track players will need to practice drafting, passing, and controlled turning. Simply racing flat out won't win a race.

In the end, *NASCAR 99* isn't going to win any converts from *GT*, but it is sure to please those looking for a good stock car challenge. While not a huge improvement over *NASCAR 98*, it is a better game, and makes it a worthy upgrade if only for the Dual Shock support.

RATING

★★★★☆



NASCAR 99's level of detail can be seen in the interior shadows. They change as the car moves



NHL 99

Platform: **PlayStation**
 Publisher: **EA Sports**
 Developer: **EA Sports**

It's one step forward and two back this year for EA's hockey franchise. Even though some improvements to the game were made from last year's superb effort, it's somehow taken a huge hit in terms of gameplay and framerate, and framerate especially is at the root of *NHL 99's* problems. It hovers in the low 20s and not only does the game jerk around, but it affects the responsiveness of the controls so that precision movement is high impossible.

Compared to the silky frame rates and tight control of *NHL 98*, this title seems more like the lackluster *97* effort than a new version. Heck, even the opening movie is a pale shadow of *98's*

adrenaline-inducing intro.

On the brighter side, many welcome improvements have been made to the game, most notably in the larger variety of animation routines among the characters. Despite the fact that they don't move smoothly, the range of movement, especially in the goalies, is very nice. A shot power meter is also welcome and helps you gauge your power shots much more accurately than before. There has even been some concession to beginning players with the addition of an easy mode and an new "coach training" mode. And of course, for hockey purists, all of the team rosters are updated.

The move has been made to high resolution, but we'd gladly take the lower resolution for a game that played faster. Even the fights are bland and don't convey the excitement of the sport. And, strangely enough, players will actually declare fights on each other from across the arena (we don't understand it either). What EA has given us this year is more of an attempt at a purist hockey game rather than the intense hockey experience they have delivered before. While a purist hockey game is certainly not a bad thing, it's just not that much fun to play, and that's the bottom line.

RATING

★★☆☆☆



TV-style replays are still utilized to give you a feel of watching the game at home

PSYBADEK

Platform: **PlayStation**
 Publisher: **Pygnosis**
 Developer: **Pygnosis**

For a game that's been hyped for nearly two years, *Psybadek* arrives as a huge disappointment. You choose between two different snowboarders, one female (Mia) or one male (Xako), and guide them through a huge number of courses and minigames so they can rescue their friends. You also collect power-ups and grab "stars" much like a platform game, and use weapons to smash enemies and defeat big bosses. Add to this a crew of wacky characters all designed in a hip, cartoonish style for maximum "attitude," and while this combination may not work for everyone, it could've made *Psybadek* a category-breaking title that merged the increasingly popular snowboarding genre with elements of the always popular platformers.

Instead Pygnosis delivered a game hampered by technological flaws and rough design that never even scratches the surface of its own potential. Controls are sketchy, with certain areas being nearly impossible to navigate due to horrible draw-in and bad collision detection.

Apart from technical problems, *Psybadek* also suffers from utterly bewildering level design. As a hybrid title consisting of "hoverboarding" and platforming, there are more than a few areas that require you to navigate tricky paths that include large gaps and island-like platforms. If you had full control over your character — being able to run, jump, or climb — this would be a piece of cake. Instead, your character has his feet firmly

planted on a board and can only really travel in two modes: full-speed or stopped. Not only is it beyond frustrating to attempt to even survive such an area, but it's simply horrible game design to expect the gamer to be able to do so.

As a concept, *Psybadek* has been dangled in front of gamers for quite a while and created at least some excitement. It's a shame that because of bad design, controls, and graphics, the potential was never realized.

RATING

★☆☆☆☆



Psybadek shows what happens when a game is good in theory, but horrible in execution

WILD 9

Platform: **PlayStation**
 Publisher: **Interplay**
 Developer: **Shiny**



Fly the friendly skies with turbine power, and don't forget to collect a few "9s" in the process

The story behind *Wild 9's* development didn't bode well. It was scrapped once and restarted almost from scratch by an entirely new team, but as it turns out, under the tightest of deadlines, the team succeeded in producing a small miracle — although the emphasis is on the "small."

Visually, the game is incredibly solid, using a number of colored lighting effects, countless character animations and very clean textures. Though space and depth are given a 3D look, gameplay is designed much like Crystal Dynamics' *Pandemonium*, in that you're only given side-scrolling movement. While this may come as a disappointment to those accustomed to 3D titles like *Tomb Raider*, this approach serves to keep the focus on action and gameplay, not exploration.

The most unique emphasis, however, is on torturing enemies. As the leader of the Wild 9, Wex, you search for kidnapped friends using his "Rig," a weapon attached to his arm that emits an electric lasso of

sorts, to capture enemies and use them in various ways, usually comprised of some sort of seriously brutal torture. The Rig can lasso in an enemy like a long rope that can then be used to smash, carry, or throw them around, much to their pain and dismay. Enemies are used to break spiked turbines, stop flamethrowers, cross spiked gaps and countless other painful things — this is definitely not a platformer in the *Super Mario* sense.

As unique and fun as this is, however, the game's rocky development history shows in its occasionally sloppy control, cliched platform structure (kill enemies, solve puzzles, fight boss, repeat), general lack of variety, and fairly short playing time. In this case, an additional delay or two might not have been a bad thing, but as it is, *Wild 9* is still not bad at all — maybe the sequel will live up to its potential.

RATING

★★★★☆

X GAMES PRO BOARDER

Platform: **PlayStation**
 Publisher: **Electronic Arts**
 Developer: **Radical Entertainment**



Stadium events like this (left) are more popular in Europe than in the U.S. The half pipe (right) enables players to catch some serious air — it's extreme dude!

In a strange last-minute bid, Electronic Arts picked up the already complete *X Games Pro Boarder*, a game that the nearly defunct Radical had completed. The two-player *X Games* offers a new twist in the snowboarding market: Licenses.

A contender in the once-slim snowboarding market, *X Games*' immediate draw is its realistic touches and twin licenses. *X Games* sports both the ESPN and X Games licenses, so all of the events from the X Games appear. As many as eight real pro boarders (Terje Haakonsen, Shannon Dunn, and Todd Richards, to name a few) are playable, so die-hard boarders and TV fans can immerse themselves in realism.

Despite the abundance of moves

(more than 150 in Pro difficulty), clever short-cut-laden courses, and all of the trappings of realism, *X Games* is at about the same level graphically where *Cool Boarders 2* was last year. What's more, character movement is choppy and fluidity is spare. The lack of perspective correction, a so-so framerate, and a slow sense of speed will bring you down.

X Games does feature some cool alternative bands, such as Rancid, the Foo Fighters, Pennywise, and a few others, but even a million licenses and the best bands can't make up for uninspired gameplay and lousy graphics. In the end, its style-over-substance, mediocre gameplay is what you'll remember the most.

RATING

★★★★☆

DETHKARZ

Platform: **PC**
Publisher: **GT Interactive**
Developer: **Melbourne House**

Despite being a shameless rip-off of Psygnosis' *Wipeout* franchise, *Dethkarz* is fast, beautiful, and seriously addictive. Complete with elevated tracks, supercharged plasma weapons, and a techno soundtrack, the only significant place *Dethkarz* breaks free from its familiar mold is in the fact that the cars (or should we say karz) sit atop four trusty rubber tires instead of a cushion of air.

Once past the *Wipeout* déjà vu factor, *Dethkarz* proves itself on the track where 20 cars battle with futuristic weapons and aggressive driving at very high speeds (up to eight players can compete against each other via LAN or modem play). The tracks, which are each set in one of four beautifully detailed zones, rise, fall, twist, and turn in an ominous, if not devious, fashion. Just staying on the track is more than enough challenge to begin with.

Learning to control your car at high speeds with competitors blasting

away from behind or trying to run your car off the road is no easy task, but the payoff is worth the effort. Learning to master the various weapons too, adds to the overall depth of gameplay. Unfortunately, the weapons are generally less effective than those of the *Wipeout* series, but they do make for some absolutely stunning visual effects.

The only thing missing from *Dethkarz* is just that little touch of innovation that could have sent it over the top. Unfortunately, as breathtaking as the game may be, and as well as it performs as a traditional racing game, there is absolutely nothing here that hasn't been done before. Of course, we don't expect every game to be a genre-shattering experience, but it never hurts to have an innovative touch or two thrown in for good measure.

RATING

★★★★☆



It looks like *Wipeout*, and it plays like *Wipeout*, but in the case of *Dethkarz*, that's not a bad thing



DOMINANT SPECIES

Platform: **PC**
Publisher: **Red Storm Entertainment**
Developer: **Red Storm Entertainment**

If evolution is survival of the fittest, Red Storm's *Dominant Species* has just fished itself out of the realtime strategy gene pool. While it is innovative in some ways, the end product isn't worth the trouble.

The basic concept behind the game, like all realtime strategy games, is to crush enemies and hog the resources. Simple enough. Red Storm puts a "Myth meets *StarCraft* collides with *Total Annihilation*" spin on it, however, by introducing 27 different units, with an experience-based enhancement system, a totally 3D map, and limited unit formation grouping. The assortment, from Swingclaws to Deathmongers, have enough variety between them for potentially addictive single and network gameplay.

Unfortunately, all that potential goes to waste, as the interface design and AI are atrocious. The default map controls require two hands and the dexterity of a concert pianist to even attempt decent navigation, then pretty much requires a third hand during complex multifront battles. The camera controls' learning curve is a Sisyphean task in itself, arguably tougher than even the first *Myth*'s controls. It doesn't help either that the standard interface map is almost useless, and that macro-level navigation needs a special map window.

Likewise, the poor AI is especially frustrating. Unless given specific instructions to guard, stay put, or patrol, all mobile units will chase enemy soldiers at the drop of a hat. There's

nothing more frustrating than watching a group of defenseless Gauphs try to attack a Painmonger just because it's come within detection range. Unless all units are given superspecific orders, unintentional offensives are the order of the day. Combine that with the lousy navigational control, and later levels of *Dominant Species* turn into a slowtime strategy game.

RATING

★★★★☆



***Dominant Species*: Surprise, it's another forgettable real time strategy game**

COMMANDOS: BEHIND ENEMY LINES

Platform: **PC**
Publisher: **Eidos Inter.**
Developer: **Pyro Studios**

Just when you're convinced there's nothing new under the gaming sun, along comes Eidos with *Commandos: Behind Enemy Lines*, a unique strategy game that blends realtime action with wargaming.

You're given six very tough, very dangerous men to perform complex missions behind enemy lines in WWII. Each commando has special abilities, and all are crucial to success. Fortunately, the game offers quick, friendly tutorials to acquaint you with each one, from the team leader, Green

Beret, through to the Sniper and the Spy. Each commando has a pistol, with unlimited ammunition, but other weapons include machine guns, grenades, a harpoon gun, bear traps, acoustic decoys, and cyanide-filled syringes.

But the main weapon is stealth. Enemy soldiers patrol every location, and use both sight and sound (and smell, through guard dogs) to ferret out the Commandos and raise the alarm. Each mission demands careful organization. The challenge is to use the skills of your men to slip in, destroy objectives, and escape in shortest time possible.

Twenty well-designed missions will take you to Norway, North Africa, France,

and finally into Fortress Germany herself. Action is mainly mouse-driven, though keyboard shortcuts are available. If the game has a weakness, it's that you are in complete control, managing each Commando's movements. It would be helpful if the Commandos could defend themselves when under attack without depending on the player.

A few missions ping at your memory. If so, there's a reason. Eric Adams, who produced *Commandos*, says his inspiration came from several WWII movies, including *The Dirty Dozen*, *Guns of Navarone*, *Where Eagles Dare* and *The Great Escape*. But with or without movie inspiration, *Commandos* is a genuinely

original game—truly challenging, graphically gorgeous, tough as shoe leather, and one heck of a lot of fun.

RATING

★★★★☆



The fun *Commandos* deserves to be a sleeper hit

URBAN ASSAULT

Platform: **PC**
Publisher: **Microsoft Games**
Developer: **Terratools**

It isn't very often that a completely new game genre is born. This year saw the first in a while — the realtime strategy/action hybrid. 3D0's *Uprising* was the pioneer, followed soon after by one of the greatest sleepers of the year, Activision's *Battlezone*. Microsoft's *Urban Assault* falls somewhere in between, mostly because its gameplay is somewhat convoluted.

You start each of *Urban Assault*'s 40+ levels in your host station — a giant, energy-sucking, weightless structure that serves as headquarters. From here, you create new war machines and structures, almost instantly, out of pure plasma. Once these are created, you have the choice of deploying them remotely or piloting any of them yourself.

That's what this new genre is all about: giving the player that cranium-inflating sense that they're commanding huge armies while still providing the option of full-tilt action. Most of UA's levels can be finished either through third-person strategy, first-person action or a mix of the two, and that's just how it should be. *Urban Assault* achieves its goal quite nicely.

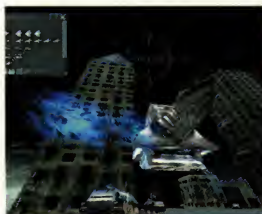
Battlezone, however, accomplished exactly the same goal, but with far more panache. This is due, in part, to some extraordinarily poor creative choices on the part of UA's design house. Foremost is the game's interface. To play the strategy and action elements effectively, the player must somehow master simultaneous use of the joystick, mouse, and keyboard. Try it. It's not pretty.

UA's second flaw is its lack of depth. Each level is like the one before—the same kind of mission over the same

hilly terrain with the same burnt-out buildings and the same sandy-brown sky. There's enough variation to keep you playing, but not enough to really consider this a major step forward in a new sub-genre that's ripe for exploitation.

RATING

★★★★☆



Urban Assault is a vision of a grim future with a few interesting touches, but its somewhat convoluted gameplay holds it back

KNIGHTS AND MERCHANTS

Platform: **PC**
Publisher: **Interactive Magic**
Developer: **Joymania Entertainment**



Knights and Merchants came out of nowhere, but it turns out to be a pretty decent little strategy game

Here's a strategy game with something for everyone. Want to build a society from the ground up? It's here. Create a thriving economy? No problem. Raise an army and go to war? Bloody battles await.

Knights and Merchants is a European import, brought to the U.S. by Interactive Magic. If the medieval setting reminds you of other strategy pastimes, there's a reason. The German-based Joymania design team includes some of the same wizards who created *Settlers 1* and 2.

The graphics are lush: Pennants fly, smoke curls, tiny figures chop wood, hew stone, bake bread, plant fields, and mash grapes, all with suitable sound effects. If a figure stops working, a little thought balloon appears to show he

needs stone, wood, tools (or even a knife and fork if he's hungry), and he won't work again until a serf delivers the missing item.

The only problem is that you'll be too busy to enjoy the visuals. You'll be running the village and fighting pitched battles. You'll skirmish in the hills, defend bridges, and order bloody charges, usually against superior forces. Twenty single-player missions will test your battle savvy, as well as scenarios on 10 multiplayer maps. But remember to feed your troops. If you don't, they'll die.

Knights may not break much new ground, but it follows prior footprints with style. So if you're tired of battling aliens, Orcs, and the villains of Nod, it's a nice little alternative.

RATING

★★★★☆

HEXPLORE

Platform: **PC**
Publisher: **Infogrames**
Developer: **Infogrames**

As further proof that old-school slash-and-chop RPGs aren't dead yet, Infogrames has produced a simple chiller called *Hexplore*. All the prerequisites are here: swords and sorcery, magic keys, weapons and armor, experience bonuses, and a zillion monsters to kill. You are MacBride, a knight on his way to the Crusades. But your camp is overrun in the barbaric Carpathian wilds. When you regain consciousness, you discover that most of your companions have been massacred. The few survivors have been taken to the castle of Garkham, a powerful wizard.

Your job is to find the castle and rescue them, and various archers, warriors, and sorcerers will offer to join you. Choose your three companions carefully — some of the voices are grating, and you'll have to listen to them

for a long time.

Hexplore is an easy, but extensive, game. The plot propels you through 10 universes and more than 250 maps. Terrain comes in many forms: Forests, mountains, deserts, dark dungeons, hidden temples, even an oriental palace. Early monsters aren't very intimidating (the Glore giggle, rather than growl), but they get tougher and there are 7,000 monsters in all, including more than 15 bosses. If you die, walk your ghost to a resurrection stone and you'll recover. There are also health potions and grottoes to regenerate life points.

Hexplore is no *Diablo*, but it offers an excellent introduction to the genre. Newcomers can move up to the heavy-hitters later, once they learn the ropes.

RATING

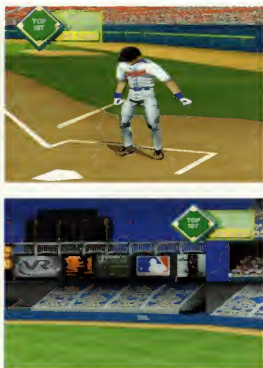
★★★★☆



Hexplore is essentially a *Diablo* clone, but it packs in a lot of variety and manages to be pretty fun nonetheless

VR BASEBALL 2000

Platform: **PC**
 Publisher: **Interplay**
 Developer: **Interplay (VR Sports)**



VR Baseball 2000 may use the Messiah engine, but in fact, the graphics are its weakest point. The gameplay and interface make up for it

Over the past few years, Interplay has had more than a little success with its VR sports line. But while *VR Baseball 2000* probably won't do anything to damage its reputation, it won't do much to advance it either. The game's biggest claim to fame is that it utilizes the much-heralded, but heretofore-unseen Messiah 3D engine, which gauges the distance of 3D models on the screen, and on-the-fly adjusts the number of polygons used. Theoretically, this would allow for very high polygon counts on closeup models (over 100,000 per player in this case). Unfortunately for the end user, there's very little evidence that the technology makes any particular difference to this title.

The stadiums (all 30 of them) look great, and with a little distance, the players look really good as well. Unfortunately, up close, where the players are supposed to look their best, a few misshapen body parts make the entire

package suffer. But what hurts a lot more is the occasionally awkward and unnatural animation.

It comes up a short in the AI department as well. Again it's the little things, but when a left fielder tries to throw out a batter at first base, there's something not quite right. Other quirks include relief pitchers coming in at inappropriate times and infielders reacting too slow to cover bases. Minor details, perhaps, but they do add up.

The one place *VR Baseball 2000* does shine is in its gameplay control. Advanced hitting and pitching techniques lend a new level of strategy to the game, and the base-running mechanics are as detailed as we've seen anywhere. Considering the fact that Interplay was working with an untested engine this year, *VR Baseball 2000* is pretty promising, but in many ways it's still not quite there yet.

RATING

★★★☆☆

DEADLY ARTS

Platform: **Nintendo 64**
 Publisher: **Konami**
 Developer: **Konami**

Every once in a while a game comes out that makes you wonder what the company's motives were in releasing it. Somewhere, at some time in production, somebody important must have known that the game would be totally and utterly bad, yet the decision was made to continue the project. There is even a point where the company could have probably saved themselves some face and

money by just not printing the cartridges and leaving the game unreleased. Unfortunately, *Deadly Arts* has made it through all of these stages unchecked and now has been inflicted upon the general buying public as a "fighting game."

What you will be fighting when you plug this game into your (unsuspecting) N64 is the urge to return it as soon as possible. You'll also be fighting against the controls as you try to get your unresponsive, uninspired characters to do what you want. There's just not much in this game to redeem it. Hell, there's even a long (for N64) load time each time you change characters on the select screen that will have you pulling out your hair in frustration. Even the graphics, with their washed out low-poly look will make you cringe.

The only redeeming feature this game may have had is the well-thought-out character creation and training mode. Unfortunately, to train you must actually use the same fighting engine as the rest of the game, and that makes the whole experience pretty dismal.

The bottom line is that this is not only a crappy fighting game but a sad excuse for a game in general. Bad graphics, bad control, and utterly generic designs all add up to an experience you'll want to miss at all costs.



Everything about Deadly Arts has this same low-poly, high-blur look, even the "special" effects

RATING

★★★☆☆

RUSH 2: EXTREME RACING USA

Platform: **Nintendo 64**
 Publisher: **Midway**
 Developer: **Atari Games**



Rush 2 isn't as well designed as the original, but it has a tweaked engine and a cool stunt track

Last year, Atari Games surprised everybody with its port of *San Francisco Rush* to N64, one that actually played better than its arcade predecessor. More depth, more levels, and a newly added key system all added up to one of the best arcade-to-home conversions of all time. One year later, Atari Games and Midway are at it again, this time with a direct-to-N64 sequel entitled *Rush 2: Extreme Racing USA*.

Rush 2 runs on an enhanced version of the original engine with a number of gameplay and graphic improvements. There are more tracks and vehicles than ever before — more than 12 courses and upward of 16 cars. In addition there's an option which enables players to customize cars and a number of secret goodies Atari has thrown in.

However, the tracks themselves

are far less exciting than those in *SF Rush*, with more emphasis on fast racing than on high-flying jumps and exploration. That's not to say there aren't any *Rush*-esque turns, jumps, or hidden routes, but they have been toned down. This, in our opinion, is a bad thing because *Rush* is beloved for those over-the-top stunts.

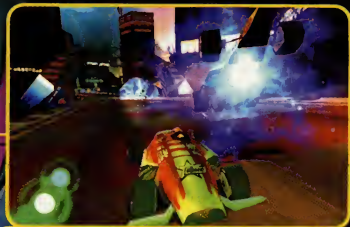
Luckily, Atari somewhat makes up for this deficiency with quite possibly the most addictive racecourse we've ever played in a game of this type: The "Stunt Track." Brimming with jumps, ledges, and freedom, you can go anywhere, and flip and twist your car in outrageous jumps.

Trust us, you'll be hooked. And that's to say nothing of the game's two-player mode. Overall, *Rush 2* is a worthy successor to the original.

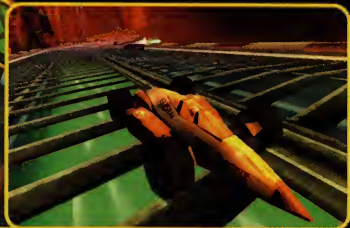
RATING

★★★☆☆

Turn your PC into an arcade machine



Set new speed records and rack up kill counts on the 12 fastest tracks on Earth and beyond.



Take your pick from 12 combat racing machines tooled up and ready for mayhem!



Go high with jumps and stunts at 60 plus 3D-accelerated frames per second, and land hard with force feedback-enhanced collisions and combat!



Race fully loaded for combat with over 10 futuristic weapons and shields.

"...the most visually impressive
arcade combat racing game..."
adrenaline vault

DETHKARZ™

www.melbournehouse.com/dethkarz

Exclusively Distributed by GT Interactive

Dethkarz © 1998 Beam International. Dethkarz is a trademark of Beam International. Melbourne House is a registered trademark of Beam International. All rights reserved. Windows is a registered trademark of Microsoft Corporation. Published by Melbourne House and Distributed by GT Interactive within the United States.



ADVANCED STRATEGIES

How designers play their games

WIPEOUT XL

SYSTEM: PLAYSTATION PUBLISHER: PSYGNOSIS DEVELOPER: PSYGNOSIS

INTERVIEWED: ANDY SATTERTHWAITE, PRODUCER, PSYGNOSIS

Next Generation: What are your strategies for playing through? Do you have different strategies for different parts of the game?

Andy Satterthwaite: I've played it so much that these days I just pick it up, have a quick blast round a few tracks, then move on. When it first came out, it was the challenges that were fun: win all the tracks, unlock and complete the phantom challenge, then win the two phantom tracks, and unlock my favorite: the

NG: Are you the best at your game on the team?

AS: No. Rob Francis, the designer, and Chris Roberts, our main programmer, were the two best on the development team. Chris could get around one of the tracks (Sagamatha) in about 17 seconds — which is ludicrous.

NG: Have you learned any new strategies or skills from watching other people play your game?

seconds, then pop! You're back carrying on with the race. It doesn't crash the game — it doesn't even harm your race (much). It's just an odd bug we couldn't find.

NG: Were there any titles that directly influenced *Wipeout XL*?

AS: Obviously *Wipeout*, but that was influenced by *Mario-Kart* and *F-Zero*.

NG: What's your most satisfying *Wipeout XL* moment?

AS: Winning on my favorite track: Odessa keys. If you get the last corner (before the pits) right, you know you're in for a killer time (because that's the only place I usually crash).

Of course, taking out the first-place guy on the line is pretty damn good. Then there's the quake weapon or killing someone in one shot with the plasma bolt.

NG: Were there any ideas for the game that didn't make it in?

AS: We had a couple: We wanted a ninth track, but we ran out of time. We wanted the ships to have multiple engine flares, but they slowed down the game too much. We wanted collisions with the scenery, infinite draw distance — basically the ideas which didn't make it were the ones which hurt the framerate. I don't think anybody missed them, though.

I think the sheer skill of some people has surprised me. Nevin Gaston (our codesigner on *Wipeout 64*) managed to complete *Wipeout XL* on his first attempt — that's ludicrous

Piranha Challenge. I still have to complete this, but it's good fun. One of my favorites is racing single races with weapons off, it sets a really tough control challenge — no shooting others out of the way, it's all a question of best line and good judgement — excellent fun.

Actually, here's a tip: In the challenges (Challenge 1, Phantom) and Challenge 2, Piranha) weapons are on by default. However, due to a slight, ah, oversight, if you switch off weapons in the menu it has the effect of turning off the weapons for the AI ships, but not for the player — quite an advantage. (Note: I haven't checked this in *WOXL*, but it's the case in *WO2097* — the PAL version).

NG: Which particular circuit or challenge do you find the most difficult?

AS: The last circuit — Spilskinanke (an anagram of Snake Pliskin from "Escape from NY") has some really unusual bits in it, some three-sided track sections you can slide onto (and off) and it's got some evil bends. I try to save my auto-pilot for the bits I can't do. It's a gamble, because you could have used it earlier and picked up something else useful, but nothing costs you race positions like hitting a wall hard — so auto-pilot everything.

AS: Rather than strategies, I think the sheer skill of some people has surprised me. Nevin Gaston (our codesigner on *Wipeout 64*) managed to complete *Wipeout XL* on his very first attempt — that's ludicrous, too.

NG: Any amusing bugs or glitches in the shipping version?

AS: There's one really rare case — I've only seen it once on my copy. At some point, for no apparent reason, the camera will zoom out to the very far distance, making the track seem really small. Everything goes incredibly slowly for about 10



We wanted the ships to have multiple engine flares, but they slowed down the game too much



Wipeout Team





BIOWARE CORP.:
James Ohlen, Lead Designer, Director of Writing and Design; Ben Smedstad, Assistant Producer; Ross Gardner, Designer/QA



BALDUR'S GATE

SYSTEM: PC PUBLISHER: INTERPLAY DEVELOPER: BIOWARE CORP.

INTERVIEWED: RAY MUZYKA, PRODUCER & CFO/JOINT-CEO,

Next Generation: In any PC RPG, there are many different ways to play each game. Do you have a personal strategy for doing so, and what works best for you?

Ray Muzyka: This isn't really answering the question per se, but for me, the cool thing about the battles in *Baldur's Gate* is that they are all approached differently. It seems that every one requires a different approach.

The best part of these seemed to be that the approach was consistently valid inside each battle — that is, you could try the strategy that worked in previous battles over and over, but it wouldn't work. Then you could try a new approach, again over and over, and it would work (almost) every time with a particular battle. It really makes you feel like you are solving a challenging problem with each encounter you face — very satisfying.

Above all, BG is an RPG, but the realtime strategy engine we included is very fun. The cool thing about the storyline is that you can actually role-play your characters, particularly in multiplayer — and playing the good or evil part actually causes people in the world to react differently to you.

James Ohlen: Use "web" a lot. It's a great spell and really immobilizes your enemies. A ring of free action or similar types of items are vital to this strategy, or missile weapons all round. Summon monsters then



The cool thing about the battles in *Baldur's Gate* is that they are all approached differently

haste them — nasty.

Ross Gardner: There are different strategies for each different class; for Fighter, make sure Biggs never gets held, and save often. Thieves are absolutely essential for their hide in shadows and detect traps, as well as a mage — or two.

NG: When you play through the game, which enemies or specific areas do you find the most challenging?

RM: Tazok's tent was quite difficult for me — it required 16 reloads, more than any other single battle in the game. I wasn't feeling particularly creative that night, so I kept entering the tent and rushing headlong into melee combat.

JO: Centeol the Spider Queen is pretty tough. She's surrounded by loads of ettercaps and spiders, and is difficult to beat. The Acolytes of Sarevok are deadly as well.

Ben Smedstad: Any mage conflict. You need to use good strategy to even hope to win.

NG: Are you the reigning champ at *Baldur's Gate*? If not, then who on the team is?

RM: No. I wish it were so, but not only are there a lot of people here who are much better, I'm positive

that there are thousands of people who will buy the game and think of things that no one here even dreamed of. Or so I hope!

JO: No, there are others in the office who are better (**RM:** Not too damn likely!)

BS: I'd like to think so, but the truth is that the hardcore gamers out there will surpass me after a while!

RG: I'd like to think that I am the best but if that is the case, it is really only because I have played it the most

NG: Have you been surprised by strategies practiced by other players during the playtesting of the game?

RM: Yes and no. The game is a faithful reproduction of the pen-and-paper game of AD&D, so much of what works in AD&D also works in *Baldur's Gate*. Nevertheless, people always surprise me with their creative solutions.

JO: No, not really, the game runs very close to AD&D pen-and-paper rules — most of the strategies you can use in the pen-and-paper game you can also use in *Baldur's Gate*.

BS: Of course, I'm surprised by the different combos of spells with items, character class abilities, etc. other players use. The game is so huge that creative players will always find new and cool ways to solve a

problem.

RG: At every turn it seems as though a new strategy pops up from somebody with a creative mind playing through a situation with different characters and playing styles. It is really incredible how diverse all of the possibilities are in *Baldur's*.

NG: What's your crowning achievement in playing *Baldur's Gate*?

BS: 90 hours to complete the game, the first in our office to ever do so start to finish (**RM:** Curse you, Ben!)

RG: Before "hide in shadows" worked, there was this mage tower, inside which were two creatures (who I couldn't even think of surviving more than one round against, let alone killing) who now turn friendly when you talk to the mage. However, this was not the case when I first arrived. My strategy then was to load up my fighter with healing potions and send him in as a distraction while another character finished up business with the mage, hoping the fighter would live long enough. It worked, barely. It was a very memorable encounter.

NG: Were there any features that made it in the game that weren't originally supposed to?

RM: "It's not a bug, it's a feature!" as we like to say. At one point in the game, this annoying fellow named "Noober," who's intended to represent the annoying people that we've all had to deal with in our lives, starts to pester you repeatedly. He questions your characters' abilities as adventurers, mocks your clothing style, and generally aims to annoy. He closes with a comment about how this was the longest

conversation he had ever had, and how in most villages people ended up throwing rocks at him, which was somewhat of a coincidence as at that point I had just targeted him with a magical slingstone, which was flying through the air squarely at his head. Now *that's* satisfaction!

NG: Which character in the game do you find the most interesting?

RM: There are a lot of them, but most are ones I wouldn't choose to have in my party very long: Tiax, who is the self-styled ruler of the planet — and watch out anyone who gets in his way. Xzar, the delusional, mad wizard who periodically waxes philosophical. Ajantis, the paladin who does not waver when good deeds are called for — even if most people would consider them suicidal.

JO: Minsc, because he's crazy. Alora, because she's so annoying.

BS: Minsc — he's the berzerker warrior that everyone's going to love. He kicks ass!

RG: The most interesting character is Imoen, who is the first character that you meet. At first, she's really annoying but it's funny how she grows on you throughout the game, until she became my favorite, plus I think that she has the best character animation in the game.

NG: What games did you play that inspired or influenced the design?

RM: The RPGs that I really enjoyed in the past include (in no particular order): *Wizardry*, *Ultima III/IV*, *Ultima Underworld*, *System Shock*, *Pool of Radiance*, *Curse of the Azure Bonds*, *Dark Sun*, *Betrayal at Krondor*, *Wasteland*, *Fallout*, *Diablo*, and *Bard's Tale*, plus a few others.



JO: *Diablo*, *Warcraft II*, the Goldbox AD&D games, *Fallout*.

BS: All of the great ones! We chose from the features of many of the great games in the past to put together the game we wanted to play ourselves.

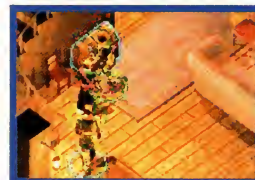
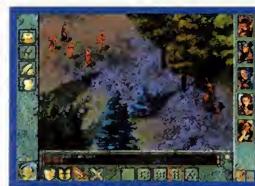
NG: Do you have any personally memorable gaming moments in *BG*?

RM: Starting it. It still gives me a feeling of quiet joy.

BS: Playing multiplayer with James and Ross, watching James hide in shadows and sneak behind the mage casting a big spell — and backstabbing for (lethal) triple damage.

JO: When I fought the Iron Throne mercenaries in the Undercity and my party died in under six seconds.

RG: I love the feeling after a very tough encounter (that has taken a couple hours of intense playing and strategy) when I finally see the villain flying off my hammer in little chunks.



I love the feeling after a very tough encounter when I finally see the villain flying off my hammer in little chunks

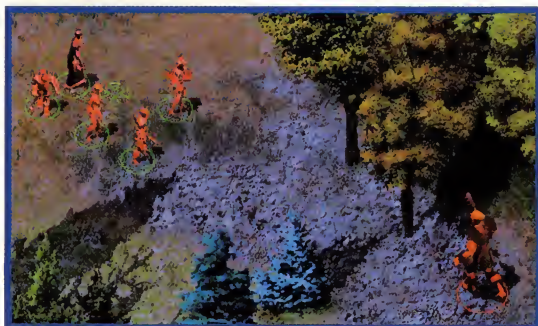
have been great, and would be great for the sequel, but there was just no time to implement them properly.

NG: What specific advice do you have for players just starting a game of *BG*?

RM: Probably nothing that players won't come up with themselves after a few sessions. But I suggest they try various PC character combinations in the single-player game, and that they try the multiplayer game at some point — it's a lot of fun to play through the game with other people in your party.

JO: Do lots of subquests!

RG: Have a diverse party, make sure you have at least one thief and at least one mage, make sure to save often and remember: "There are probably 100 ways to survive each encounter — just be creative.



It is really incredible how diverse all of the possibilities are in *Baldur's*



Kudo Tsunoda



UPRISING X

SYSTEM: PLAYSTATION PUBLISHER: 3DO DEVELOPER: 3DO

INTERVIEWED: KUDO TSUNODA, PRODUCER, 3DO

Next Generation: *Uprising X* features a good combination of strategy and fast-paced action, do you have any general advice for the newcomer to the game?

Kudo Tsunoda: One of the coolest things about *Uprising X* is the depth of gameplay and the replay factor inherent in the title. We purposely designed this title to be played in a variety of ways. The player is able to customize their army for each mission, choosing between units with different strengths and weaknesses. Each level provides an opportunity to apply a new and unique strategy for success depending on what type of army you have amassed.

You can choose between four types of units: Infantry, Tanks, Aerial Assault Vehicles (AAVs), and Bombers. Infantry and Bombers are great for taking out buildings, factories, com links, etc. Tanks and AAVs are better at destroying other units on the battlefield.

Customizing your army to include more Tanks and AAVs creates a dynamic that favors the player hauling ass into battle, blowing up everything in sight, taking out the main mission objectives, and deploying Tanks and AAVs to take care of the massive amounts of enemies on the screen at once.

If you decide to take more Infantry and Bombers into battle, it's better to deploy your units at specific targets and use the Wraith to lay waste to all of the enemy units trying



Everyone on this team knows that the producer (me), can easily whup anybody else on the team in any of our one- or two-player modes

to massacre your troops.

Either way you play, the game is a nonstop fiesta of trigger-twitching, pulse-pounding, on-the-battlefield, war-frenzied carnage.

I'm a "just rush in and start blowing stuff up" type. In almost all situations, I will rush in, deploying my units and firing weapons madly in all directions. But when taking over large bases and fighting the Citadel towers, I will definitely hang back and let loose a few units to soften up the enemy defenses. Without the help of your units, even I will end up getting "iz-snizzly-biz-atched." The best strategy is to use your call-in units. Deploy, deploy, deploy!

NG: What part of the game do you find most difficult? Do you have a specific strategy for getting past it?

KT: Getting past the Imperium bases and defeating enemy Zeppelins are two of the toughest challenges in the game. To take out Imperium bases, the best thing to do is use your call-in units and concentrate on the Citadel. In battling the Zeppelins, I only have one piece of advice — circle strafe.

NG: Who are the best at the game on the team? Give us your best

trash-talking speech.

KT: While I must admit the level designers have spent the most time playing their individual levels, and the programmers have spent more time playing the game overall, everyone on this team knows that the producer (me), can easily whup anybody else on the team in any of our one- or two-player modes. Quite frankly, the ease with which I can completely destroy any other member of the team at this game is embarrassing.



In battling the Zeppelins, I only have one piece of advice — circle strafe

But I guess since I am really the best gamer on the team, I have an unfair advantage.

NG: What are some interesting strategies for playing *Uprising X* that emerged out of playtesting?

KT: Just like any other game, there are always subtleties that manifest themselves after endless hours of playing. One of my favorites is the "cockroach" strategy. Building nothing but Infantry factories quickly produces a never-ending stream of units to deploy. The only drawback is that the Infantry are easily destroyed and will often get run over by tanks.

Another cool gameplay element is shooting down AAVs (both enemy and friendly) that are flying toward other enemy units. This causes them to spiral out of control and crash into units you want to destroy.

NG: What are some of the challenges that you and the team use to gauge who's the best player?

KT: *Uprising X* isn't really based around a best time or score. The levels are centered around unfolding our compelling storyline and the characters in the game.

We do provide kill stats and level completion times. But we have more fun trying to get through levels using only one type of call-in unit, or using only call-in units and not firing any Wraith weaponry, or trying to get through levels by using the power of the Wraith alone. There is so much action and carnage going on that getting through even the easiest

levels without using all the resources at your disposal is quite a challenge.

NG: Are there any cheats, tricks, codes, or debug insights that were added for personal reasons? What are they and how do they relate to the team?

KT: We spent a lot of time developing the character and unit voice-overs in the game and each personality and line has a little bit of somebody from the team in it.

The character of Sgt. Jepps is based on one of our more personality-intense team members, Game Designer J. Epps. His father was a marine drill sergeant and his office definitely reflects that.

The Xaja voices are the brainchild of Associate Producer Lloyd Kinoshita. He often rambles around the office in a state of lunacy muttering things to himself that sound more like a strange alien dialect than any human language.

A lot of the battlefield unit voices and lines came from my personal experiences in Vietnam as well as the philosophies that I honed as Sensei of the Cobra-Kai karate studio in Southern California.

NG: During the course of creating *Uprising X*, were there any "unanticipated features" that were left in intentionally or unintentionally?

KT: Most of the best game ideas come from these "unexpected features." Things like our Ion Cannon being able to shoot through any type of terrain or world objects. While this



was not how it was originally designed, when it was first implemented the collision system was not working properly. But we had so much fun lining up multiple units and blasting enemies through mountains that it had to stay.

We also had incorrectly used the tank debris explosion mechanism when our Infantry died. You were shooting Infantry units and big tank chunks were flying out of the explosion. With a small amount of tweaking, these now look like flying body parts.

In its early stages, our AI system had units crashing into other objects and buildings. After the programming team spent the time to sort this problem out, it was reimplemented in a limited form and called our "kamikaze attacks."

NG: Can you recall any particularly memorable moments playing *Uprising X*?

KT: Most of the memorable moments in the game deal with our storyline. There are a lot of twists and turns that make the missions immensely fun. Certainly, I don't want to reveal any of these.

The first appearance of the Imperium Zeppelins is awe inspiring. And the ending battle against the evil Emperor Caston is worth the time invested in the game to get there.

NG: Could you give us an example of some of the things that didn't make the last-minute cut for the game?

KT: G.E.O.R.G.E. the droid (General Engineering Operations Robotic



There are a lot of twists and turns that make the missions immensely fun

Genius), our comical, personality-filled call-in unit. He was supposed to do things like open gates, disarm enemy bombs, and handle database downloads. There were also alien sheep that would populate the landscape and make strange noises as the player runs them over.

But we've been pretty lucky. Hardly any portion of our original design had to be cut. This, more than anything, is a testament to the enormous talent and insane work ethic of this team. It also shows that when a company like 3DO is dedicated to making quality games, and gives the development teams the time and resources necessary to make A+ titles, that you don't end up losing features that should be in the game.



Most of the best game ideas come from these "unexpected features"



VIGILANTE 8

PLATFORM: PLAYSTATION PUBLISHER: ACTIVISION DEVELOPER: LUXOFLUX CORP.

INTERVIEWED: DAVE GOODRICH, ARTIST/DESIGNER, LUXOFLUX CORP.

Next Generation: *Vigilante 8* incorporates some heavy combat against tough enemies. What kind of advice do you have for first-time players?

Dave Goodrich: Generally, I like to destroy the deadliest and/or most annoying enemies first — Boogie, Clyde, and Beezwax qualify in my book. Also, each level features some type of deadly hazard. I usually like to use these interactive elements to my advantage, as they are often far more damaging than standard attacks. In addition, I always try to pick up all health, weapons, and power-ups even if I don't need them — this helps to keep them out of my enemies' hands.

NG: Is there a segment you find especially difficult? Any advice for those stuck in the same spot?

DG: The falling boulders in Canyonlands have a way of sneaking up on you and so does the bomber in Aircraft Graveyard. I turn up the volume and listen for anything unusual that might try to blindsides me. It's also challenging to try beating the game with underpowered vehicles such as the Leprechaun. Its special weapon is quite powerful, so it's simply a matter of avoiding contact with enemy cars and fire.

NG: Are you the best at your game?

DG: It's hard to say, as there are many excellent gamers out there.

But I like to think I'm the king of V8, and I'll challenge anyone who would like to prove me wrong!

NG: Have players discovered strategies that you never expected for the game? Which ones have surprised you most?

DG: Jennifer O'Neil from Activision's QA department discovered that you could get around the weapon delay by rapidly cycling your weapons while firing a shot at a time. We never considered something like this. Then, Jennifer came along and unleashed a simultaneous stream of mortars, missiles, and rockets, obliterating all enemies within a few moments. It seemed like a cool trick, so we tweaked it a bit and left it in.

NG: What achievement in *Vigilante 8* gives you bragging rights over the team?

DG: My 138 whammies and 10 totals against 12 buses in single-player Arcade mode.

NG: What cheats or codes in the game do you find the most interesting or invaluable?

DG: One of the lesser known codes is SEE_ALL_MOVIES. It allows playing all ending movies in sequence. A few of the movies connect with one another and we wanted a way to see them as one continuous feature.

Another rare code is SLOW_MOTION_ON, which disables the game from adapting to the current framerate. That was a debugging feature, because if you're slowly stepping through code, you don't want the game to start calculating the next frame based on how long you've been debugging.

NG: Any amusing bugs or glitches in the shipping version?

DG: The reflection mapping mechanism and the reflective alien saucer were results of pure experimentation and weren't



It's also challenging to try beating the game with underpowered vehicles such as the Leprechaun

originally intended for the game.

NG: What games influenced the design of the game?

DG: *Interstate 76*, *Twisted Metal 2*, *Spy Hunter*, *Car Wars*, *Mortal Kombat* and *Stunt Island*.

NG: What is your favorite moment in the game?

DG: Some of the best moments come from successfully using traps such as the Cactus Patch, or using level hazards against your enemies. Occasionally, one of the enemies will trigger an environmental hazard, which takes another enemy by surprise; this is especially satisfying when the player is low on health. Also, V8's sophisticated physics model and path-finding algorithm often result in some amazing movielike car scenes.

NG: What ideas for the game ended up on the cutting room floor?

DG: The game was supposed to be a single-player experience and was completely redesigned a few months into the project. There was also a Stunt Track level that was eventually nixed. A few other features were dropped, mostly because of consistency issues. The interesting part about V8's development is that unlike a lot of other projects, many important features were added toward the very end, after the team realized that certain elements dramatically enhanced the fun factor.

HEAVY GEAR

PLATFORM: PC PUBLISHER: ACTIVISION DEVELOPER: ACTIVISION

INTERVIEWED: TIM MORTEN, LEAD DESIGNER

Next Generation: What are your strategies for playing through? Do you have different strategies for different parts of the game?

Tim Morten: My strategy is to cheat. That's the biggest reason to become a game developer. You can always win at your own game.

NG: What part of the game do you find most difficult? What's your strategy for getting past it?

TM: Multiplayer is the hardest for

Heavy Gear?

TM: Survival is reward enough. I am nothing without my cheat codes.

NG: Were there any in-jokes that the team added to the game that may not be understood by regular gamers?

TM: My favorite cheat code is ctrl+alt+shift+bedouinprince, which toggles invulnerability. A visiting journalist wrote a preview where

unintentional effect of making all the enemies incline their heads toward the direction they're shooting. We liked the way it looked, so we left it in.

NG: What other games had the biggest influence *Heavy Gear*?

TM: *MechWarrior 2* was definitely our biggest influence when designing *Heavy Gear*.

NG: Is there a particular moment in the game you find more satisfying than others?

TM: I love the mission where you have to jump from an arch onto the top of a landship and infiltrate its defenses to disable its progress.

NG: What ideas for the game ended up on the cutting room floor?

TM: There was a bedroom scene in the original script for the cut-scenes that was cut well before the shoot. It has no place in an action game, but there were some pretty funny ideas when you're working with a bunch of overgrown adolescents.

He described the project producer, Chacko Sonny, as a brooding Bedouin Prince. We've been teasing Chacko relentlessly since then

me because there are no cheat codes. My strategy is to play under an assumed name.

NG: Are you the best at your game?

TM: Definitely not. I've been beaten by 14-year-olds.

NG: Have players discovered strategies that you never expected for the game?

TM: There's one weapon in particular, the bazooka, that wound up being a lot more powerful than we had originally envisioned. Players have been exploiting that since the game was first released.

NG: What is the most satisfying achievement for you while playing

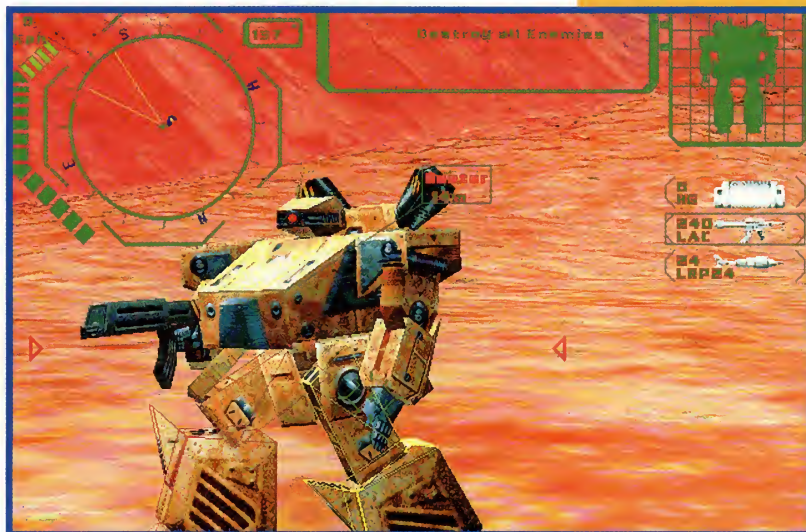
he described the project producer, Chacko Sonny, as a brooding Bedouin Prince. We've been teasing Chacko relentlessly since then. Some game reviewers are clearly repressed novelists.

NG: Were there any unintentional codes left in *Heavy Gear* that ended up enhancing how the game is played?

TM: We put in code to turn the player's head, and it had the



The bazooka wound up being a lot more powerful than we had originally envisioned



Tim Morten



STAINLESS STEEL STUDIOS



Join The Team That's Developing Premier Real-Time Strategy Games For The Next Millennium

Stainless Steel Studios, Inc., founded by Rick Goodman (creator/lead designer for Microsoft's Age of Empires®), and based in Cambridge, Massachusetts has embarked on the development of real-time, multi-player strategy games for the next millennium.

Here's a unique opportunity to participate in the creation of innovative, top-quality game titles and become part of a new, fast-growing game development company that is poised to become the industry leader in the real-time strategy game genre.

We believe that success is based on teamwork. If you are a die-hard gamer who is hard working, self-motivated, energetic and you are interested in having major input into the creation of 'AAA' game titles, Stainless Steel Studios is looking for you!

We're looking for the very best artists, character animators and senior game programmers in the industry.

Visit our web site:

<http://www.stainlesssteelstudios.com>

or contact us at:

ilovemyjob@stainlesssteelstudios.com.

All inquiries will be kept strictly confidential. We are an equal opportunity employer offering an excellent salary and benefits package.

Rick Goodman: *Recipient of the 1998 Computer Game Developer Conference's "Annual Achievement Award for Game Design and Development".*

Try Next Generation FREE!

3Dfx Voodoo2 game previewed, page 62 • More Project X news, page 18
Nintendo 64 • PlayStation • PC CD-ROM • Macintosh • Arcade • Online

NEXT GENERATION

The world's #1 computer and videogame authority

Metal Gear Solid

The last great
PlayStation game?

Only \$1
AN ISSUE!

Call
1-800-678-3643

to receive the next issue of Next Generation –
AT NO RISK. If you're pleased with what you see, we'll
send you 11 more issues (12 in all) for only \$12 –

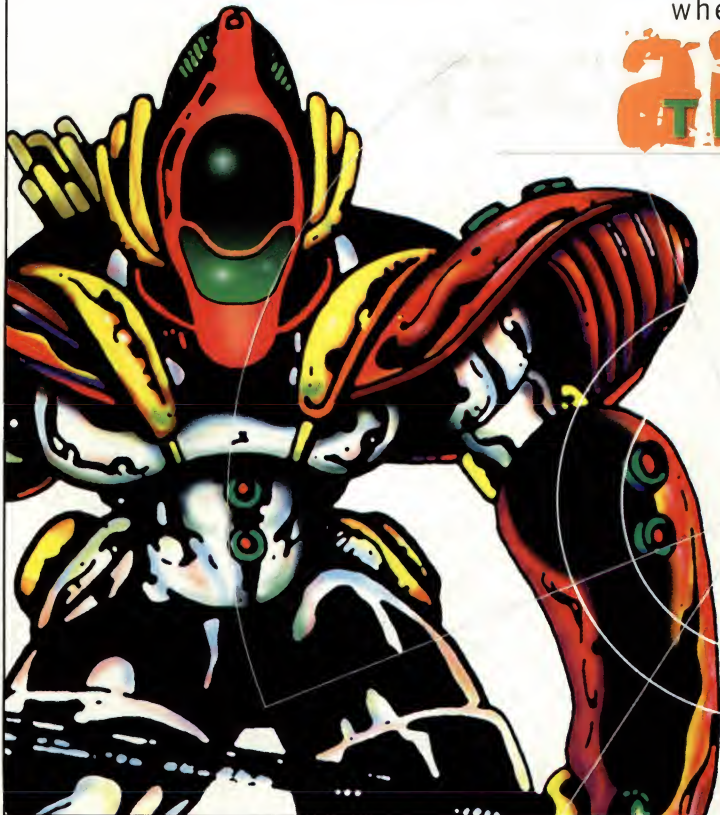
THAT'S 83% OFF THE COVER PRICE!

With your paid order, we'll send you a CD-ROM wallet,
ABSOLUTELY FREE!

Welcome
to the **WORLD'S #1**
Computer & Video Game Authority!!

Offer good in U.S. only. Cover price is \$5.99. Canada: U.S.\$26, includes GST. Foreign:
U.S.\$36. Prepaid in U.S. funds only. Please allow 6-8 weeks for delivery of first issue.

5NGM9



where

art meets
TECHNOLOGY

www.aii.edu

- Computer Animation
- Multimedia
- Graphic Design
- Video Production
- Web Site Administration
- Housing
- Financial Aid, if qualified
- Employment Assistance

15 Locations: Atlanta, Chicago, Dallas,
Denver, Fort Lauderdale, Houston,
Los Angeles, Minnesota, Philadelphia,
Phoenix, Pittsburgh, Portland,
San Francisco, Schaumburg, Seattle

Call Today
1.800.592.0700

**AI THE ART INSTITUTES
INTERNATIONAL®**

300 Sixth Avenue • Pittsburgh, PA 15222

©The Art Institutes International, Inc., 1998 NXGEN

All programs not available at all locations.



Top 3D Programming & Art Talent PSX, N64, DreamCast & and PC Computer Games

Are you respected for your creative vision and talent, and interested in joining a development team with a ten year history of award-winning titles?

Stormfront Studios is looking for individuals who'd enjoy working on first-tier games with top game publishers. Our titles include NASCAR '98 & '99, Madden Football, Star Trek: Deep Space Nine, Andreotti Racing, Byzantine, La Russa Baseball, etc.

We're adding to our staff and looking for talented people for the following positions:

- **Racing Team:** Technical Director, Lead PSX Programmer, Lead PC Programmer, Lead N64 Programmer, Entry N64 Programmer, Entry PSX Programmer
- **Baseball Team:** Lead PC Programmer, Sr. or Lead Internet Programmer, Lead Console Programmer, Entry PC Programmer
- **Fantasy Role Playing Team:** Lead PC Programmer, Senior PC Programmer, Lead Character Designer: 3D Animator, Lead Environmental Designer: 3D Modeler/Map Artist, 2D/3D Designer/Artist
- **Game Show Team:** Sr. PSX Programmer
- **Arcade Action Team:** 3D Max Artist with 2D talent

Ours is an open environment of small, mixed-discipline development teams, where high standards are respected and your contributions will be recognized. We offer a very competitive compensation and benefits package.

Please send your resume to:

Stormfront Studios, Attn: M. Daglow, 4040 Civic Center Drive
San Rafael, CA 94903 Fax: 415-461-3865, e-mail: mdaglow@aol.com
www.stormfrontstudios.com

Extreme Education

LEARN:

- 3D Studio MAX
- Visual Basic
- Alias Wavefront
- Adobe Photoshop
- Fractal Painter
- Superscape
- World Tool Kit
- C and C++ Programming
- SoftImage
- Macromedia Software

**Digital Animation
& Production**

**Software
Engineering**

Virtual Reality

Multimedia

Placement,
Financial Aid,
VA Services

Visit Our
Website & Tour
The Campus
In VR



UNIVERSITY
Advancing Computer Technology

Call Today for Information **1-800-658-5744**

E-mail admissions@uact.edu ■ <http://www.uact.edu>

When I was growing
up, I always drew,
I still draw, but now I
combine time and sound.



MARC WAKEFIELD
BFA, ANIMATION
CLASS OF 1999

THE UNIVERSITY OF THE ARTS

BROAD & PINE STREETS, PHILADELPHIA, PA 19102
FOR INFO OR FREE BROCHURE: 1-800-616-ARTS FAX: 215-875-5458 WWW.UARTS.EDU

DESIGN, FINE ARTS, MEDIA ARTS, CRAFTS, DANCE, MUSIC, THEATER ARTS,
ARTS EDUCATION, WRITING FOR MEDIA AND PERFORMANCE,
MULTIMEDIA, COMMUNICATION

now hiring

Advertising Inquiries

(415) 468-4684 x467
Imagine Publishing, Inc.
150 North Hill Drive
Brisbane, CA 94005

Next Generation

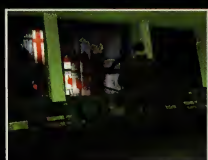
career opportunities section

now hiring online:

<http://www.next-generation.com/howhiring.html>

Vigilance

Welcome to the Real Underworld.



A world of surveillance, secret weapons, strategy and photo-realistic action. A World where 8 counter-terrorist agents are thrust into explosive missions of cooperative stealth and deadly conspiracy. Where knowing the right gun to pierce a bulletproof vest is as important as the ability to hack a security code. A world where the price of freedom is eternal:



VIGILANCE.

- Single-player And deathmatch modes
- Real-world counter terrorist missions
- 40 unique weapons and power-ups



Play live,
online competition
Only on



HEAT.NET

www.vigilance.com

Vigilance, the Vigilance logo, HEAT and SegaSoft are trademarks of SegaSoft Networks, Inc.
All rights reserved.

ENDING

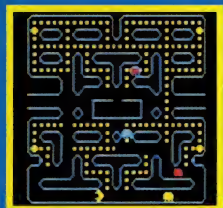
Next Generation does the Time-warp

System Shock

WHAT EVER HAPPENED TO?

Muncher (Bally Professional Arcade)

Muncher was Bally's answer to *Pac-Man*, and was the only home version for quite some time that featured the maze with its correct aspect ratio.



In 1977, Atari's Video Computer System (VCS) proved that the home gaming market was indeed profitable. As a result, dozens of electronics manufacturers clamored to get a piece of the action. Bally's Professional Arcade stood out as one of the most advanced consoles of the day. The system's central processor was the Z80 (today found in the Game Boy Color). Its graphics were crisp and the games were much more complex than Atari's. Versions of Midway's *Wizard of War* and *Galaxian* were among the most impressive titles released for the system. However, because the console was also billed as a home computer, the extra cost for its



alphanumeric keyboard and expandability pushed the cost to \$100 more than that of the competition. It would eventually resurface in 1980 as the Astrovision Astrocade, but it would never achieve the success of the likes of Atari's VCS.



Retroview

by **Steven Kent**, author of a forthcoming book on the history of videogames

THE SILENT PARTNER

The October 1996 issue of *Wired* Magazine featured a meticulously researched article called "Spawn of Atari" that traces the accomplishments of Atari's alumni. Nick Montford, who wrote the article, apparently left no stone unturned as he tracked down Atari veterans, but he neglected one person of note: Don Valentine.

In truth, Montford may have left out Valentine because he was never an employee of the company; but he was on Atari's board of directors and changed the company's destiny. In fact, Valentine may have had more impact on the evolution of Silicon Valley than any Atari employee with the exception of Nolan Bushnell, the man who founded the company.

Unlike the rest of the "spawn of Atari," Valentine is not a videogame

player; he is a hard man who has never written a computer program, built a computer, or run a software company. His impact is financial, not material — Valentine is a successful venture capitalist.

I read a story about Valentine. In the story, a guy had gone into his office, and Don intimidated him so badly that he passed out. Don denies it, of course.

Trip Hawkins

Silicon Valley has many successful venture capitalists, but Don Valentine is the dean. He was fairly new to the business in 1974, when Nolan Bushnell came to ask for money. "He looked like a hippie," says Valentine. "A lot of the people from the techno-nerd world looked like hippies back then."

Bushnell had already founded

Atari by then. He had grown the company into a successful manufacturer and wanted to expand his business by manufacturing a home version of his famous *Pong* arcade game.

I remember a company that was largely organized around a coin-operated bar presentation [for the] male-dominated, beer-drinking world. My instincts were that I wondered about the [Mafia] and how much they participated in this kind of a product, and would they control distribution? This was before there was any real attempt to organize a product for the home.

Don Valentine

Valentine offered to work with Atari, and raised approximately \$7 million for operating capital; but he

QUESTION

After dismal sales, the remaining stock of which Nintendo arcade shooter was converted into *Donkey Kong* arcade units?

Populous

Almost a decade since its inaugural release, Peter Molyneux's former acolytes at Bullfrog have revisited *Populous*, the inspirational design brief behind EA's forthcoming third installment, *Populous: A New Beginning*.

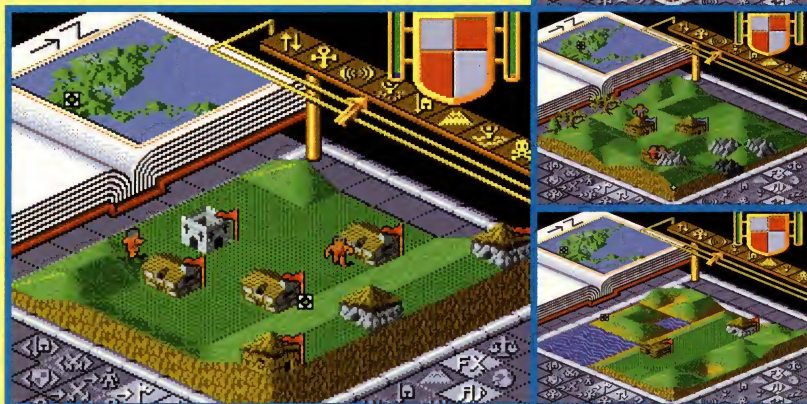
Its two predecessors boast \$5 million combined sales. Yet, Bullfrog had *Populous* rejected by a number of publishers before Electronic Arts picked it up. With EA's growing marketing savvy married to Molyneux's vision, the first "god" sim graced over a dozen formats.

Incredibly, *Populous* enjoyed commercial success in Japan, a market notorious for its apathy toward most entertainment software from the West. It remains a significant achievement.

Many "new" genre iterations suffer inauspicious beginnings, their creator's ideas and ideals overshadowed by a lack of technical and aesthetic expertise. Conversely, *Populous* was far ahead of its time in its usage of an engine that gave players the power to

rotate and alter the scale of its isometric world. Similarly, its emphasis on "nurture" as opposed to "control" — like Maxis' *Sim City* — singled it out as a pioneering, offbeat release at a time when the digital joystick and twitch gameplay dominated.

System	Amiga/ST
Publisher	Electronic Arts
Developer	Bullfrog
Released	1989



Originally an inspirational title for the Amiga and ST, *Populous* made the transition to many formats, including the SNES (from which these shots are taken). The game essentially paved the way for the likes of *Civilization*

insisted on a few conditions. He wanted someone other than Bushnell to run Atari's operations, so Joe Keenan took over.

I thought of Nolan as the great visionary, someone who would be bored by day-to-day operations. Joe Keenan volunteered to take care of most of the day-to-day operation stuff.

Don Valentine

The term "arcade" had bad connotations, and there had been allegations of organized crime involvement in the coin-operated amusement industry. Valentine would not have invested in an arcade company; he was willing, however, to get into the "home television game" market. This was great with Bushnell. He went to Valentine because Sears wanted to

market a home version of Pong.

I think he was inclined to stay with the bar and arcade environment that he knew and preferred. But I think he also recognized the unit volume in that world was always going to be sort of small, and that there was no way to participate in the cash flow of the quarters.

Nolan is a quick study and was quickly able to adjust his vision and evolve a product from the core technology into one that would sell for a reasonable price at retail and be played by one or more individuals at home.

Don Valentine

In 1976, Bushnell sold Atari to Warner Communications and Valentine was bought out, but that did not end his involvement in videogames or computers. When

Steve Jobs, who was at Atari at the time, asked Bushnell if he wanted to invest in his fledgling computer company, Bushnell referred him to Valentine. When Trip Hawkins, who was working at Apple at the time, needed money to start Electronic Arts, he went to Valentine. Still, Valentine's shrewdest investment has little to do with games.

The name is Cisco Systems. The market value is \$30 billion. It's the primary supplier in the world of internetworking equipment — personal computers, games, local area networks, etc.. They do it on a worldwide basis, and we finance the company — alone. In 1986, we put in \$2.5 million, and bought one-third of the company. Our \$2.5 million is worth one-third of what has become a \$30 billion company.

Don Valentine

ANSWER
RadarScope



McVANS VIDEO GAME TRADER

www.McVansVideoGames.com
Phone: 219-493-3722

YEAH, WE GOT

SOME GAMES

FINAL FANTASY 1, 2, 3, 7
CHRONOTRIGGER
ZELDA

BREATH OF FIRE 1, 2, 3
SHINING FORCE 1, 2, 3
PHANTASY STAR 1, 2, 3, 4
MANIAC MANSION
BOMBERMAN
HERZOG ZWEI
ARKANOID
LUNAR 1, 2
PAC-MAN

ACTUALLY WE HAVE
1000'S MORE TO LIST BUT...

TOO BAD
ADVERTISING
COSTS SO

MUCH !!!
IT'S SIMPLE, WE HAVE IT ALL !

SATURN
MASTER SYSTEM
TURBOGRAFX
SUPER NES
NEO GEO
GENESIS
JAGUAR
LYNX
NES
N64
PSX
& MORE

McVANS VIDEO GAME TRADER

www.McVansVideoGames.com

Phone: 219-493-3722

Letters

We've got a proposal for you

Hello writers at **Next Generation**. My name is Benjamin Ruin. I'm writing to ask you to print the statement, "Eu-gen Kim will you marry me?" in your next issue of **NG** in the letters section. You are the fifth form of media (three have turned me down and two have accepted) that I have asked to print this, and I would truly appreciate this. I have been a devoted reader and subscriber since you started this magazine.

Benjamin Rubin

vulcan100@hotmail.com

There you go. Good luck.

I have a complaint about your magazine's reviews. While they remain the very best in the industry, some have just been held off or missed. It seems that games for the N64 have been ignored the most. The review for *Mystical Ninja* was very late. I have yet to see a review for *Major League Baseball* featuring Ken Griffey Jr. and a review for the N64 version of *Nagano Winter Olympics 98* was not published. While the games may not be the best, your readers still would like to see reviews for

them. Your reviews are definitely the best and the *Gamer's Guide* is great, but this still doesn't make up for the lack of some reviews.

Barnes14@aol.com

Every month, the *Finals* section is one huge battle for space, and there are often additional problems with receiving product early enough so that, given the magazine's three-month lead time, a review will be printed in a timely fashion. In other words, sometimes a title simply falls through the cracks.

The lead-time question is especially acute with N64 titles, simply because the cartridge format makes review ROMs expensive, and many companies don't send them — often we're sent shrink-wrapped copies the day they ship. Also, since so many titles are released for PlayStation and PC, the only fair strategy is to try and balance the available space by the number of available titles per system — another area where N64 notoriously comes up short. It's just one more painful compromise in a world full of them. Sorry, but every magazine faces these kinds of problems, and we're only human.

A few months back your subscriptions department told me that the magazine would no longer be available with a CD-ROM. That was fine until I noticed that you are putting CD-ROMs on the newsstand editions. It looks like companies donate the CD for advertising, but why don't I get it with my subscription? I paid for the magazine up front and I have shown that I am a dedicated reader, and this my thanks? The person who picks up the magazine at the newsstand when he feels like it gets a CD-ROM and I get nothing when I have shown that I read the magazine every month? If you could let me know why or fix the problem I would really appreciate it.

Christopher Zavatchen

christopher_zavatchen

@mk.com

The CD-ROM is currently a newsstand-only promotion. However, we've gotten a lot of letters like yours, and we are exploring the possibility of once again offering a CD-ROM with the subscriber copies. We'll let you know when we decide it's possible.

In issue 47, you announced that issue 312 would hit stores in December of 2020, but the date on issue 312 says May. I guess computers still won't completely correct human error, even 22 years down the line, eh?

Steven Hancock

estoc@hotmail.com

If you read the text more closely, you would have noticed issue 312 is from a parallel universe, in which **Next Generation's** lead time is such that the May issue is actually printed in December. Sorry for not making this clear.

After reading the interview with Jim Whims in **NG 47** I was deeply upset. I enjoy the N64 system, and I think Jim was wrong to insult the power of N64. He



Nintendo fans took exception to Jim Whims' comments in **NG 47** — pretty much everyone else thought he was pretty sharp

basically said *Mario 64* was crap and Nintendo should have launched with a sports game. He's just saying that because Sony paid him to. *Mario 64* is one of the best games ever! And who gives a damn about the sports games on PlayStation? You can get the good ones for your PC.

Kevin Sykora

kevin_sykora@hotmail.com

For the record, nobody paid Jim Whims to say anything (which a number of readers seemed to want to accuse him of). It's also worth pointing out that Whims has worked with Nintendo in the past, and his opinions are probably better informed than most. As for whether any of them have merit, only time can tell.

This is really a trivial matter, but I was reading through the Lionhead Studios article in **NG 47** when I come across a picture of a "citizen" with the caption underneath reading "The citizens that inhabit the world are made up of just 12 polygons" That is 100% impossible. I would venture that the left leg holds at least nine polygons. It is simply not possible to create a humanoid using only 12 polygons (by comparison, a cube has 12 polygons) and I would like to know what the actual number is (and if Lionhead Studios gave you that number, they lied to you and deserve a slap on the fanny). I come up with 63 at the very least (granting nine to each appendage, nine to the torso and nine more to the head).

Like I said, this isn't terribly important, I just have my modeling radar constantly on and while the shots of the landscapes and morphing cows made my brain tingle (and sure, my ego took a little blow at quality of the models),

the citizens stopped me dead in my tracks. And my curiosity has prompted me to write to you for the correct number. Something in me says that maybe a "0" was left off and that each citizen is in reality 120 polygons. Regardless, I thoroughly enjoy your magazine and hope you keep up the good work!

Cayenne Mandua

cyclopsx@stealthprd.com

Lionhead insists the citizens are 12 polygons apiece. Don't ask us how. And frankly, there are many other developers who deserve a good spanking more than Lionhead.

I'm a fan of *Leisure Suit Larry*, and I saw a mistake in your article "A question of Character" (**NG 46**). You said *Leisure Suit Larry* starred in *Leisure Suit Larry 4*. There was no *Leisure Suit Larry 4*. They just skipped four and went on to five. He also starred in *Leisure Suit Larry 7* and *Larry's Casino*.

Kenneth Tai

kennytai@hotmail.com

You're correct. **Next Generation** regrets the error. The author has been tracked down and pummeled with a blunt object.

Your magazine is great, and I actually feel loyalty to you guys. I just really miss the Gallery section. I can understand how getting content might be a problem, but seeing printed images along with a caption listing the name of the software used and the artist was wonderful.

Evan Eusey

euseye@valu-line.com

Finding the artwork was never



Top to bottom:
Bullfrog's *Populous: The Third Coming* by John Miles using 3D Studio MAX; **Digital Integration's *F/A-18E Super Hornet*** by Simon Hegarty and Paul Martin using Lightwave; **Europress' *Rally Championship '99*** by Andrew Bolt, Andy Seymour and Andrew Morris using Lightwave; **LK Avalon's *Reah*** using 3D Studio 4.0



the problem. Finding the space within the magazine, however, is — especially during the holiday season when there are hundreds of games to cover and only a finite number of pages. Gallery will make a return, just as soon as we have room again — in fact, here's a little one to tide you over.



Next Generation Letters, 150 North Hill Dr., Brisbane, CA 94005.
Fax us: (415) 468-4686. Email us: ngonline@imaginemediamedia.com

Next Generation Statement of Ownership

Post Office Notice: Statement of Ownership, Management and Circulation for Periodicals class privileges as required by 39 USC3685: 1. Title of Publication: Next Generation 2. Publication No. 1078-9693 3. Date of Filing: 11/5/98 4. Frequency of Issue: Monthly 5. Number of issues published annually: 12 6. Annual subscription price: \$20.00 7. Complete mailing address of known office of publication: 150 North Hill Drive, Brisbane, CA 94005 8/9. Complete address of the headquarters of general business offices of the publisher, editor and managing editor: Publisher: Bill Blummer - same address, Editor: Chris Charla - same address, Managing Editor: Chris Zender - same address 10. Owner: Imagine Media, Inc., 150 North Hill Drive, Brisbane, CA 94005 11/12. N/A 13. Publication name: Next Generation 14. Issue date for Circulation Data below: November-98 15. Extent and nature of circulation given in this order, number of average copies each issue during preceding 12 months followed by actual number of copies published nearest filing date. A. Total number of copies 220,017, 235,514 B. Paid and/or Requested Circulation 1. Sales through dealers and carriers, street vendors and counter sales 29,469, 29,800 2. Mail subscriptions 93,118, 152,776 C. Total Paid and/or Requested 122,587, 182,576 D. Free Distribution by Mail 2,512, 2,492 E. Free Distribution Outside the Mail 900, 0 F. Total Free Distribution 3,412, 2,492 G. Total Distribution 125,999, 185,068 H. Copies not distributed 2,296, 1,445 1. Office use, left over, unaccounted, spoiled after printing 2,296, 1,445 2. Returns from News Agents 91,723, 49,001 I. Total 220,017, 235,514 16. Publication of Statement of Ownership is required and is printed in this issue of this publication January-99. 17. I certify that the statements made by me above are correct and complete: Holly Klingel, VP of Circulation.

A buyer's best purchasing tool.
A retailer's #1 resource.
A leader's handbook.
Breaking news.
Credible product reviews.
The most accurate release list.
And sales tips for store managers.

Tailor-made for the interactive entertainment distribution and retail channel

GamesBusiness

Targeted to buyers, retail store managers, and executive decision-makers in the interactive entertainment channel, as well as marketing and sales executives, job recruiters, and venture capitalists from within the industry, Games Business is the only choice for current, lucrative information about the trade.

The magazine that makes you better at your job **GamesBusiness**

For more information, phone 415-468-4684, or go to www.gamesbusiness.com

From the publishers of

NEXT
GENERATION

Our global affiliate

CTW

Published by

imagine
MEDIA WITH PASSION

Number of games ever made: **Tens of Thousands**

Number of games you can't live without: **Fifty**

Number of magazines that know the difference: **One**

Next Month



**NEXT GENERATION BRINGS YOU THE DEFINITIVE
TOP 50 GAMES OF ALL TIME.**

**Next Generation #50
on sale January 19, 1999**

Smart readers have already subscribed. To find out how you can save money
and guarantee your copy, turn to the insert between pages 112 and 113.

Standard Mail enclosed in
the following editions:
M

Bulk Rate
U.S. Postage Paid
Waseca, MN Facility
Permit No. 327

Next Generation (ISSN# 1078-9693) is published monthly by Imagine Media, Inc., 150 North Hill Drive, Brisbane, CA 94005, USA. Periodicals Class postage paid at Brisbane, CA, and additional mailing offices. POSTMASTER send changes of address to Next Generation, PO Box 53680, Boulder, CO 80328-3680. Newsstand distribution is handled by Curtis Circulation Company. Subscriptions: one year (12 issues) US: \$34. Canada: \$48. Foreign: \$58. Canadian price includes postage and GST (GST# R 128 220688) CPC Int'l Pub Mail #0781126.

YOU ARE LUKE,
SO LOOK LIKE LUKE.



© Lucasfilm Ltd & ™ All rights reserved. Used under authorization.
The "N" Logo is a trademark of Nintendo of America Inc. ©1998 Nintendo of America Inc. www.nintendo.com
Game, System and Expansion Pak sold separately.



Through the flight goggles of *Star Wars*®: *Rogue Squadron*™. **A**s the Rebel flight commander, you have 5 starfighters to fly, 15 planets to save from destruction, and a hangar full of proton torpedoes, cluster missiles and laser cannons all at your fingertips. **N**ow go blow the evil Empire to bits. Only you can save the galaxy on N64®. **W**ant even more hyperspace? Then boost your system with the N64 Expansion Pak™ for supercharged graphics.

GET  OR GET OUT™

MAGICAL
TETRIS
CHALLENGE



**COMPLETELY
ADDICTIVE**
**DECEPTIVELY
SIMPLE**
**OUTRAGEOUSLY
MICKEY!**



JANUARY 1999

CAPCOM

WWW.CAPCOM.COM

Next Generation OnLine, www.next-generation.com

**NEXT
GENERATION**

Voted best game magazine by
Western Publications Association



Made in 1997 using original Tetris software. © 1999 Next-Generation. All rights reserved. The Nintendo 64 logo is a trademark of Nintendo. The Tetris logo is a trademark of Tetris Company. The Capcom logo is a trademark of Capcom. The Next-Generation logo is a trademark of Next-Generation. The WPA logo is a trademark of Western Publications Association.